lovely language words vide images nite

Ed Annink
Max Bruinsma

lovely language words divide images unite

ISBN/EAN 978-90-8690-127-2

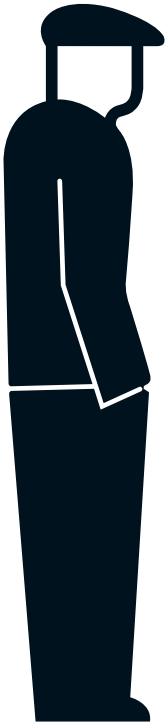
Published by Veenman Publishers, Rotterdam

Copyright © 2008 Veenman Publishers, Rotterdam
All rights reserved. No part of this publication may be reproduced or transmitted in any form or by any means, electronic or mechanical, including photocopy, recording or any information storage and retrieval system, without permission in writing from the copyright owner(s).

We have tried to exercise all copyrights within the legal requirements. Nevertheless, anyone who thinks they can claim certain rights can contact us.

lovely language words divide images unite

Ed Annink
Max Bruinsma



Gerd Arntz's Isotype pictogram for 'unemployed' (1920s) is a small masterpiece of simplicity and expression. Remarkably, the slightly crooked impression the man gives is not the result of a bent back or head – which are drawn straight – but by placing the head slightly forward, and by the twist in the forearm. With his hands in his pockets and his trousers slightly dropped, the figure emanates hopelessness.

Introduction **9**

A language for the visual era **25**

Isotype 55
Otto Neurath 75
Gerd Arntz 85
Gesellschaft und Wirtschaft 93

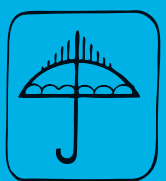
From infographics to visual dialects **127**

Infographics 145
Pictograms 175
Visual language 211

Literature 288
Photocredits 290
Colophon 292







An international selection of infographics and pictogram designs, featuring work by, among others:

Otl Aicher (Germany)
Gerd Arntz (Germany)
Lars Arrhenius (Sweden)
Ruedi Baur (France)
Gert Dumbar (The Netherlands)
Fabrica (Italy)
Mieke Gerritzen (The Netherlands)
Nigel Holmes (USA)
Susan Kare (USA)
Max Kisman (The Netherlands)
Pippo Lionni (France)
Koert van Mensvoort (The Netherlands)
Paul Mijksenaar (The Netherlands)
Otto Neurath (Austria)
Charles Sandison (Finland)
Andreas Siekmann (Germany)
Erik Spiekermann (Germany)

“The enormous amount of information also forces us to make choices. It is quite impossible indeed to read, see, ponder, understand and then remember all of it. There is a limit to what we can digest.”

Sticky Images

On any given day, we are being appealed and tempted by an overload of messages – news reports, commercial advertisements, photos and graphic images from all over the world. We approximatively receive around 4000 of such impressions per day, through newspapers, television, radio, magazines, computers and on the streets, whether we want them or not. More than 90% of all e-mail that is being sent around the world is spam, unsolicited commercial information. The competition between printed and digital media leads to take-overs and bankruptcies. Information is the fundament of our society and governs our economy. The enormous amount of information also forces us to make choices. It is quite impossible indeed to read, see, ponder, understand and then remember all of it. There is a limit to what we can digest. So we choose, mostly on the basis of what is closest to us and that we can therefore understand. Often, these choices are related to our profession, but mostly our personal interests dictate what we select from this cornucopia. What increases one person's knowledge is of absolutely no significance to another. But the most important filter is what we have learned within the boundaries of our own culture. That determines the way we appreciate images and interpret words. We look at what we are confronted with, we read what we need or want to know, we understand what we can grasp within our own cultural background.

See, read and understand

See, read and understand. That is what this book is about. And about how we can attract people's attention and cater to their interests by illustrating information, for instance by using pictograms instead of words, or by giving a summary image instead of a wordy description. This book shows international examples of how 'images unite', as Otto Neurath put it in 1925. But also words that become images, as in the artist Charles Sandison's work 'People' from 2003 (see p.242-243). For words and images gradually merge – pictograms are visual words and many logos are word-images. And just as in verbal language, image dialects are developing in visual language. Sometimes the little man on the door to the restrooms

needs a turban to mean ‘man’ in a certain culture, instead of ‘naked person’. Somewhere else, a picture of a locally famous male singer on the door to the bathroom is enough.
Dialects and vernacular are a sign of diversity. It is remarkable that in the context of an international visual language, once designed as a universally readable and understandable communication tool, there are, again, growing countless local variants. The social poetry of this diversity is an issue which I would gladly add to the discussion about visual communication. In this light, I am curious what communication will look like in the future. Diversity is a great asset, but also causes tensions. What does the merging of words and images mean for the readability and clarity of information? Such questions intrigue me and they are, in my view, a necessary challenge for the well-informed designer of tomorrow’s information. The designer’s role as mediator and counselor seems essential to me. And an unlimited curiosity for the link between culture, society and economy is indispensable in this respect.

Post-it

Today’s society is becoming more and more intricate and intercultural. Next to the world-spanning economy, micro-economic activities are becoming ever more important. All of this requires a kind of information design that is tuned to specific contexts. And specific images and texts are an intrinsic part of that design. At the beginning of the previous century, with the development of industrialization and the rise of Modernism, the ideal of progress was thriving: the idea to share all newly acquired knowledge with as many people as possible. The tendency today is far more self-centered. The overload of images and texts, the doubts we have about the news coverage in the media – what is really true, what is manipulated? – and the sheer amount of printed and digital media, provoke a desire for filtering and containment. We want specific and seemingly personal information, tailored to our own needs. What remains of truth in this situation? Truth, as something shared by large groups of people, is often coming from science. But even these truths are under

pressure – witness the intense debates on climate change. Often, the information in magazines, on television and the internet is overwhelmingly trivial. All of this is quite far removed from the progressive ideals held by the Modernists. Visual mass communication seems to work like a low tack adhesive, it sticks for a little while, until another is pasted over it.
The image that comes to my mind is that of a human being covered in those little yellow notes with a sticky edge. The more we move, the more little yellow notes get attached to us, floating through the air as they are like autumn leaves. Tons of information are unloaded onto us, but how many of it do we really need?
The question that we would like to ask with the exhibition and this publication is as follows: Are the generic recommendations based on the socialist ideals of Otto Neurath and the image-language of Gerd Arntz still accurate? And, a good exercise in imagination and pragmatism: what will communication look like tomorrow?

Imagination

Personally, I don't fancy the idea that we would see the same images everywhere we go. Diversity and specific wishes, often based on sub-cultural fundaments, enrich the supply of image and significance. And diversity challenges our curiosity and encourages imagination and dialogue. Bruno Munari, artist and designer, asked his audience in 1960: "How come we always see a man's face in the moon? Why not a coffee machine or a sock?" We see faces everywhere, because we are so thoroughly trained to read facial expressions. Because faces are such an important means of communication. In 1960, we didn't have computers on our desks. Now look at the full moon on a cloudless night, do you see a face or a computer screen? Munari speaks of the essential fantasy and curiosity that keeps all creative disciplines going and sets an ever changing challenge. Another source of inspiration is the analytic imagination of Richard Feynman, the physicist and Nobel prize winner, who sketches the contours of curiosity in a magnificent interview with the wonderful title 'The Pleasure of Finding Things Out'. You should see it, and then

ask yourself: Is visual communication something generic or should we essentially see it as something that must support specific wishes? Or is it a combination of both, connected by curiosity?

Need to go?

My first acquaintance with Gerd Arntz' work was in 1983. A folder of the Mart Spruijt Publishing Company from 1979 entitled 'Symbols for education and statistics', full of graphic silhouettes of all sorts of objects, among which the now universally familiar symbol for 'man'. And it dawned to me for the first time that once, someone, somewhere, must have decided that one can indicate the men's room by putting that pictogram of a little man on the door. I am sure that the combination was not invented by Otto Neurath and Gerd Arntz. We have asked several well-versed people on the subject, but no-one was able to pinpoint the origin of the restroom symbols to a certain period or person. But I can safely suggest that the work of both these gentlemen certainly played a large role in the inspiration for it. All over the world it is now understood that the little man or woman on the sign means restroom. You can find those same silhouettes at every airport and in any public area. The basic design is always the same: depicted from the front, rather stiffly, undynamic, and very generic. Still, I often notice variations: arms with or without hands, sometimes rounded at the end, sometimes with straight angles, a short skirt or a long one, a big picture or a small one, more or less realistic. But always standing at attention and with nothing to point to the activity performed behind that door. Is this prudishness, does this need to be changed? It doesn't really matter if the little man or woman is silhouetted in a recognizable position. Our 'need to go' opens the door to many images.

Doormat

In 1990, I realized that a number of silhouettes by Gerd Arntz could also be used for other ends than statistics. By using the silhouette in a different context, just like the little man on the restroom door, you expand the meaning of the sign. A doormat in the shape of a hare at the garden door

seemed to me an interesting situation. It begs a question: do I hare off, or who's making a hare of whom? For years now, this doormat has been part of the Droog Design collection and is distributed by them internationally. The buyer finds a text enclosed about the origins of the idea and where the drawing came from. For I had merely used Gerd Arntz' drawing and have done nothing more than repositioning it.

Ed Annink, December 2007



Doormat 'Hare' and 'Hippo', 1991
Distribution by Droog Design



7000 Languages

The world speaks in about 7000 tongues and countless dialects. Since this book is about visual ways of trying to overcome the divisive forces of that mythical Tower of Babel, which divided man through verbal language, we start with a listing of all 6.964 known living languages of the world[1]. In the list on the following pages, you will also find words that seem unpronounceable, with 'letters' like '!', '/' and '±', which stand for certain African click sounds for which there are no Latin letters.

[1] www.ethnologue.com

Surajpuri Surbakhal Suri Surigaonon Sursurunga Surubu Surui Suruí do Par· Susu Susuami Suundi Suwawa Suy· Svan Swabian Swahili Swahili, Congo Swati Swedish Swedish Sign Language Swiss-French Sign Language Swiss-German Sign Language Swiss-Italian Sign Language Sylheti Taabwa Tabaru Tabassaran Tabla Tabo Tabriak Tacana Tacanec Tachawit Tachelhit Tadaksahak Tadyawan Tae' Tafi Tagabawa Tagal Murut Tagalog Tagargrent Tagbanwa Tagbanwa, Calamian Tagbanwa, Central Tagbu Tagdal Tagish Tagoi Tahitian Tahltan Tai Tai Daeng Tai Dam Tai Do Tai DÛn Tai Hang Tong Tai Hongjin Tai Loi Tai Long Tai MÊne Tai N,a Tai Pao Tai Thanh Tai Ya Taiap Taikat Tainae Tairora, North Tairora, South Tairuma Taita Taiwan Sign Language Taje Tajiki Tajio Tajuasohn Takestani Takia Takpa Takua Takuu Takwane Tal Tala Talaud Taliabu Talieng Talinga-Bwisi Talise Talodi Taloki Talondo' Talur Talysh Tama Tamagario Tamahaq, Tahaggart Tamajaq, Tawallammat Tamajeq, Tayart Taman Taman Tamang, Eastern Tamang, Eastern Gorkha Tamang, Northwestern Tamang, Southwestern Tamang, Western Tamasheq Tamazight, Central Atlas Tamazight, Temacine Tamazight, Tidikelt Tambas Tambotalo Tami Tamil Tamki Tampuan Tampulma Tanacross Tanahmerah Tanaina Tanana, Lower Tanana, Upper Tanapag Tandia Tanema Tangale Tangchangya Tangga Tanggu Tangko Tangoa Tangshewi Tanguat Tanimbili Tanimuca-Retuar„ Tanjijili Tanjong Tanna, North Tanna, Southwest Tanzanian Sign Language Ta'oih, Lower Ta'oih, Upper TapietÈ TapirapÊ Tarahumara, Central Tarahumara, Lowland Tarahumara, Northern Tarahumara, Southeastern Tarahumara, Southwestern Tarangan, East Tarangan, West Tareng Tariano Tarifit Tarok Taroko Taromi, Upper Tarpia Tasawaq Tasmate Tat, Muslim Tatana Tatar Tatuyo Tauade Taulil Taungyo Taupota Tause Taushiro Tausug Tauya Taveta Tavoyan Tawala Tawara Tawbuid, Eastern Tawbuid, Western Taworta Tawoyan T‡y Tay Khang T‡y Sa Pa T‡y Tac Tayo Taznatit Tboli Tchitchege Tchumbuli Teanu Tebilung Tedaga Tee TÊÈn Tefaro Tegali Tehit Tehuelche Teke, Ibali Teke-Eboo Teke-Fuumu Teke-Kukuya Teke-Laali Teke-Nzikou Teke-Tege Teke-Tsaayi Teke-Tyee Tektiteko Tela-Masbuar Telefol Telugu Teluti Tem TembÈ Tembo Tembo Teme Temein Temi Temiar Temoq Temuan T'en Tengger Tenharim Tenino Tenis Tennet Teop Teor Tepehua, Huehuetla Tepehua, Pisaflores Tepehua, Tlachichilco Tepehuan, Northern Tepehuan, Southeastern Tepehuan, Southwestern Tera Terebu Terei TerÍna Teressa Tereweng Teribe Termanu Ternate Tese Teso Tetela Tetun Tetun Dili Te'un Tewa Tewa Tewe Tha Thai Thai Sign Language Thai Song Thai, Northeastern Thai, Northern Thai, Southern Thakali Thangmi Thao Tharaka Tharu, Chitwania Tharu, Dangaura Tharu, Kathoriya Tharu, Kochila Tharu, Rana Thayore Thaypan The Themne Tho Thompson Thu Lao Thudam Thulung Thuri Tiale Tiang Tibea Tibetan, Amdo Tibetan, Central Tibetan, Khams Tichurong Ticuna Tidong Tidore TiÊfo Tiene Tifal Tigak TigrÈ Tigrigna Tii Tikar Tikopia Tilung Tima Timbe Timugon Murut Tinani Tindi Tingal Tinigua Tinputz Tippera Tira Tirahi Tiri Tiruray Tita Titan Tiv Tiwa Tiwa, Northern Tiwa, Southern Tiwi Tlapanec, Acatepec Tlapanec, Azoy˙ Tlapanec, Malinaltepec Tlapanec, Tlacoapa Tlingit To To'abaita Toala' Toaripi Toba Tobagonian Creole English Toba-Maskoy Tobanga Tobati Tobelo Tobian Tobo Tocho Toda Todrah Tofanma Toga Tohono O'odham Tojolabal Tok Pisin Tokano Tokelauan Toku-No-Shima Tol Tolaki Tolomako Tolowa Toma Tomadino Tombelala Tombonuwo Tombulu Tomini Tomoip Tomyang Tondano Tonga Tonga Tonga Tonga Tongan Tongwe Tonsawang Tonsea Tontemboan Tooro Topoiyo Toposa Tor· Toraja-Sa'dan Toram Torau Toro Toromono Torres Strait Creole Torricelli Torwali Totela Toto Totoli Totonac, Coyutla Totonac, Filomena Mata-Coahuitl·n Totonac, Highland Totonac, Ozumatl·n Totonac, Papantla Totonac, Patla-Chicontla Totonac, Xicotepec de Ju·rez Totonac, Yecuatla Totoro Touo Toura Toura Toussian, Northern Toussian, Southern Towei Traveller Danish Traveller Scottish Tregami TremembÈ Trieng Trimuris Tring Tringgus Trinidadian Creole English Trinitario TriÛ Triqui, Chicahuaxtla Triqui, Copala Triqui, San Martín Itunyoso Trumal Tsaangi Tsakhur Tsakonian Tsakwambo Tsamai Tsat Tseku Tshangla Tsikimba TsimanÊ Tsimshian Tsishingini Tso Tsoa Tsogo Tsonga Tsotsitaal Tsou Tsum Ts',n-Lao Tsuvadi Tsuvan Tswa Tswana Tswapong Tu Tuamotuan T,batulabal Tucano Tugen, North Tugun Tugutil Tujia, Northern Tujia, Southern Tukang Besi North Tukang Besi South Tuki Tukpa Tukudede Tula Tulehu Tulishi Tulu Tulu-Bohuai Tuma-Irumu Tumak Tumbuka Tumi Tumleo Tumtum Tumzabt Tunebo, Angosturas Tunebo, Barro Negro Tunebo, Central Tunebo, Western Tunen Tungag Tunggare Tunia Tunisian Sign Language Tunjung Tunni Tunzuii Tuotomb TuparÌ Tupuri Turaka Turi Turka Turkana Turkish Turkish Sign Language Turkmen Turks and Caicos Creole English Turoyo Turumsa Tuscarora Tutchone, Northern Tutchone, Southern Tutong 1 Tutong 2 Tutuba Tututni Tuva Tuvaluan Tuwari Tuwuli Tuyuca Twendi Twents Tyap Tyaraity Tzeltal, BachajÛn Tzeltal, Oxchuc Tzotzil, Chamula Tzotzil, ChenalhÛ Tzotzil, Huixt·n Tzotzil, San AndrÊs Larrainzar Tzotzil, Venustiano Carranza Tzotzil, Zinacant·n Tz'utujil, Eastern Tz'utujil, Western U Uab Meto Uare Ubaghara Ubang Ubi Ubir Uda Udi Udihe Udmurt Uduk Ufim Ugandan Sign Language Ughele Ugong Uhami Uisai Ujir Ukaan Ukhwejo Ukit Ukpe-Bayobiri Ukpet-Ehom Ukrainian Ukrainian Sign Language Ukue Ukuriguma Ukwa Ukwuani-Aboh-Ndoni Ulau-Suain Ulch Ulithian Ullatan Ulukwumi Ulumanda' Uma Umanakaina Umatilla Umbindhamu Umbugarla Umbundu Umbu-Ungu Umbuygamu Umeda Umon Umpila Una Uneapa Uneme Unserdeutsch Unua Uokha Ura Ura Uradhi Urak Lawoi' Urali Urapmin Urarina Urat Urdu Urhobo Uri Urigina Urim Urimo Uripiv-Wala-Rano-Atchin Urningangg Uru Uruangnirin Urub˙-Kaapor Urub˙-Kaapor Sign Language Uru-Eu-Wau-Wau Uruguayan Sign Language Urum Uru-Pa-In Usaghade Usan Usarufa Ushojo Usku Uspanteko Usui Utarmbung Ute-Southern Paiute Utu Uvbie Uvean, West Uya Uyghur Uzbek, Northern Uzbek, Southern Uzekwe Vaagri Booli Vafsi Vaghat-Ya-Bijim-Legeri Vaghri Vaghua Vagla Vai Vaiphei Vale Valman Valpei Vamale Vame Vangunu Vanimo Vanuma Vao Varhadi-Nagpuri Varisi Varli Vasavi Vasekela Bushman Vatrata Veddah Vehes Veluws Vemgo-Mabas Venda Venetian Venezuelan Sign Language Vengo Veps Vidunda Viemo Vietnamese Vilela Vili Vincentian Creole English Vinmavis Vinza Virgin Islands Creole English Vishavan Viti Vod Vono Voro Vumbu Vunapu Vunjo Vute Vwanji Wa Waama Wab Wabo Waboda Wadaginam Waddar Wadjiginy Wadjigu Wae Rana Wa'ema Waffa Wagawaga Wagaya Wagdi Wageman Wagi Wahgi Wahgi, North Waigali Waigeo Wailapa Waima Waima'a Waimaha Waimiri-Atroarî Waioli Waiwai Waja Wajarri Waka Wakawaka Wakde Wakhi Wala Walak Wali Wali Walio Walla Walla Wallisian Walloon Walloon Sign Language Walmajarri Walser Walungge Wamas Wambaya Wambon Wambule Wamey Wamin Wampar Wampur Wan Wanambre Wanap Wanda Wandala Wandamen Wandji WanÈ Waneci Wangaaybuwan-Ngiyambaa Wanggamala Wangganguru Wanggom Wanman Wannu Wano Wantoat Wanukaka Waorani Wapan W„pha Wapishana Wara W·ra Warao Warapu Waray Waray-Waray Wardaman Warduji Ware Warembori Wares Waris Waritai War-Jaintia Warji Warkay-Bipim Warlmanpa Warlpiri Warluwara Warnang Waropen Warrgamay Warrwa Waru Warumungu Waruna Warungu Wasa Wasco-Wishram Wasembo Washo Waskia Watakataui Watubela Watut, Middle Watut, North Watut, South Waur· Wauyai Wawa Wawonii Waxianghua Wayampi Wayana WayorÛ Wayu Wayuu WË Northern WË Southern WË Western Wedau Weh Wejewa Welaung Weliki Welsh Wemale, North Wemale, South Weredai Weri Wersing Western Neo-Aramaic Westphalien Wetamut Wewaw Whitesands Wiarumus WichÌ LhamtÊs Gˌisnay WichÌ LhamtÊs Nocten WichÌ LhamtÊs Vejoz Wichita Wikalkan Wik-Epa Wik-Iiyanh Wik-Keyangan Wik-Me'anha Wik-Mungkan Wik-Ngathana Wikngenchera Wilawila Wintu WinyÈ Wipi Wiradhuri Wirangu Wiru Wogamusin Wogeo Woi Wojenaka Wolani Wolaytta Woleaian Wolio Wolof Wolof, Gambian Wom Wom Wongo Woria Worodougou Worora Wotapuri-Katarqalai Wotu Woun Meu Wudu Wulna Wumboko Wumbvu Wunambal Wushi Wusi Wutung Wutunhua Wuvulu-Aua Wuzlam Xaasongaxango Xamtanga X,r,cˇˇ Xaragure Xav·nte XerÊnte Xet· Xhosa Xiandao Xibe Xipaya Xiri Xokleng Yaaku Yabarana Yabem Yaben Yabong Yace Yaeyama Yafi Yagaria Yagnobi Yagomi Yagua Yagwoia Yahadian Yahang Yaka Yaka Yaka Yakaikeke Yakamul Yakan Yakha Yakima Yakoma Yakut Yala Yalahatan Yale Yale, Kosarek Yali, Angguruk Yali, Ninia Yali, Pass Valley Yalunka Yalunka Y·mana Yamap Yamba Yambes Yambeta Yamdena Yami Yaminahua Yamna Yamongeri Yamphe Yamphu Yandruwandha Yanesha' Yangben Yangbye Yangho Yangkam Yango Yangulam Yangum Dey Yangum Gel Yangum Mon Yankunytjatjara Yanom·mi Yanomamˆ Yansi Yanyuwa Yao YaourÊ Yapese Yapunda Yaqay Yaqui Yarawata Yareba YarÌ Yarsun Yasa Yau Yau Yaul Yauma Yaur Yawa Yawalapitî Yawanawa Yawarawarga Yaweyuha Yawiyo Yawuru Yazgulyam Yei Yekhee Yekora Yela Yele Yelmek Yelogu Yemba Yemsa Yendang Yeniche Yerakai Yeretuar Yerong Yerukula Yeskwa Yessan-Mayo Yetfa Yevanic Yeyi Yi, Ache Yi, Awu Yi, Axi Yi, Azhe Yi, Central Yi, Dayao Yi, Eastern Lalu Yi, Eshan-Xinping Yi, Guizhou Yi, Limi Yi, Mili Yi, Miqie Yi, Muji Yi, Naluo Yi, Poluo Yi, Pula Yi, Puwa Yi, Sani Yi, Sichuan Yi, Southeastern Lolo Yi, Southern Yi, Southern Lolopho Yi, Western Yi, Western Lalu Yi, Wuding-Luquan Yi, Wumeng Yi, Wusa Yi, Xishan Lalu Yi, Yuanjiang-Mojiang Yiddish Sign Language Yiddish, Eastern Yiddish, Western Yidgha Yidiny Yil Yimas Yinchia Yindjibarndi Yindjilandji Yine Yinggarda Yinglish Yir Yoront Yis Yiwom Yogad Yoidik Yoke Yokuts Yom Yombe Yonaguni Yong Yonggom Yopno Yora Yoron Yoruba Yos Yoy Yuaga Yucatec Maya Sign Language Yuchi Yucuna Yugh Yugoslavian Sign Language Yugur, East Yugur, West Yuhup Yukaghir, Northern Yukaghir, Southern Yukpa Yukuben Yulu Yupik, Central Yupik, Central Siberian Yupik, Naukan Yupik, Pacific Gulf Yuqui Yuracare Yurok YurutÌ Yuwana Zabana Zaghawa Zaiwa Zakhring Zambian Sign Language Zan Gula Zanaki Zande Zangskari Zangwal Z·paro Zapotec, Alo·pam Zapotec, Amatl·n Zapotec, AsunciÛn Mixtepec Zapotec, Ayoquesco Zapotec, Cajonos Zapotec, Chichicapan Zapotec, Choapan Zapotec, Coatecas Altas Zapotec, Coatl·n Zapotec, El Alto Zapotec, Elotepec Zapotec, Guevea de Humboldt Zapotec, Gˌl· Zapotec, Isthmus Zapotec, Lachiguiri Zapotec, Lachirioag Zapotec, LachixÌo Zapotec, Lapaguìa-Guivini Zapotec, Loxicha Zapotec, Mazaltepec Zapotec, Miahuatl·n Zapotec, Mitla Zapotec, Mixtepec Zapotec, Ocotl·n Zapotec, Ozolotepec Zapotec, Sierra de Ju·rez Zapotec, Southeastern Ixtl·n Zapotec, Southern Rincon Zapotec, Tabaa Zapotec, Tejalapan Zapotec, Texmelucan Zapotec, Tilquiapan Zapotec, Tlacolulita Zapotec, Totomachapan Zapotec, Xadani Zapotec, Xanaguìa Zapotec, Yal·lag Zapotec, Yareni Zapotec, Yatee Zapotec, Yatzachi Zapotec, Yautepec Zapotec, Zaachila Zapotec, Zaniza Zapotec, Zoogocho Zaramo Zari Zarma Zauzou Zay Zayse-Zergulla Zazao Zeem Zeeuws Zemba Zenag Zenaga Zhaba Zhire Zhoa Zhuang, Northern Zhuang, Southern Zia Zigula Zimakani Zimba Zimbabwe Sign Language Zinza Zire Zirenkel Zizilivakan Zo'È Zoque, Chimalapa Zoque, Copainal· Zoque, Francisco LeÛn Zoque, RayÛn Zoque, Tabasco Zou Zulgo-Gemzek Zulu Zumaya Zumbun Zuni Zyphe Zapotec, Petapa Zapotec, Quiavicuzas Zapotec, Quioquitani-QuierÌ Zapotec, RincÛn Zapotec, San AgustÌn Mixtepec Zapotec, San Baltazar Loxicha Zapotec, San Juan GuelavÌa Zapotec, San Pedro Quiatoni Zapotec, San Vicente Coatl·n Zapotec, Santa Catarina Albarradas Zapotec, Santa InÊs Yatzechi Zapotec, Santa MarÌa Quiegolani Zapotec, Santiago Xanica Zapotec, Santo Domingo Albarradas

Ninggerum Ningil Ningye Ninzo Nipsan Nisa Nisenan Nisga'a Nisi Niuafo'ou Niue NivacIÈ Njalgulgule Njebi Njen Njerep Njyem Nkangala Nkari Nkem-Nkum Nkhumbi Nkongho Nkonya Nkoroo Nkoya Nkukoli Nkutu
Nnam Nobiin Nobonob Nogai Noiri Nokuku Nomaande Nomane Nomatsiguenga Nomu Noon Noone Nootka Norra Norwegian Sign Language Norwegian, BokmÂl Norwegian, Nynorsk Norwegian, Traveller Nyindu Nyole Nyong Nyore Nyoro Nyulnyul Nyungwe
Nzakambay Nzakara Nzanyi Nzema Obanliku Oblo Obokuitai Obolo Obulom Ocaina Od Odiai Odoodee O'du Odual Odut OfayÈ Ogan Ogbah Ogbia Ogbogolo Ogbronuagum
Ogea Ohlone, Northern Oirata Ojibwa, Central Ojibwa, Eastern Ojibwa, Northwestern Ojibwa, Severn Ojibwa, Western Okanagan Okiek Okinawan, Central Oki-No-Erabu Okobo Okodia Oko-Eni-Osayen Okolod Okpamheri Okpe Okpe Oksapmin
Oku Olekha Olo Oloma Olu'bo Ololumo-Ikom Omagua Omaha-Ponca Omati Ombamba Ombo Omi ÷mie Omotik Ona One, Inebu One, Kabore One, Kwamtim One, Molmo One, Northern One, Southern Oneida Ong ÷nge Onin Onin Based Pidgin Onjob Ono
Onobasulu Onondaga Ontenu Ontong Java Oorlams Opao Opata Opuuo Orang Kanaq Orang Seletar OrejÛn Oring Oriya Oriya, Adivasi Orma Ormu Ormuri Oro Oro Win Oroch Oroha Orok Orokaiva Oroko Orokolo Oromo, Borana-Arsi-Guji Oromo, Eastern Oromo, West Central Oroqen Orowe Oruma Orya Osage Osatu Osetin Osing Ososo Otank Otomi, Eastern Highland Otomi, Estado de MÈxico Otomi, Ixtenco Otomi, Mezquital Otomi, QuerÈtaro Otomi, Temoaya Otomi, Tenango
Otomi, Texcatepec Otomi, Tilapa Otoro Ottawa Otuho Oune Owa Owenia Owiniga Oy Oya'oya Oyda Pa Di Pa'a P··fang Paama Paasaal Pacahuara Pacoh Padoe P·ez Pagi Pagibete Pagu Pahari, Kullu Pahari, Mahasu Pahari-Potwari Pahi Pahlavani
Pa-Hng Pai Tavytera PaicÔ Paipai Paiute, Northern Paiwan Paka·snovos Pakanha Pakistan Sign Language Pak-Tong Paku Pal Palauan Palaung, Pale Palaung, Rumai Palaung, Shwe Palawano, Brooke's Point Palawano, Central Palawano, Southwest
Palembang Palenquero Palik'r Paliyan Palor Palpa Palu Paluan Palu'e Pam Pambia Pame, Central Pame, Northern Pamona Pamosu Pampangan Pana Pana Panamint Panang Panar· Panasuan Pancana Panchpargania Pande
Pangasinan Pangseng Pangwa Pangwali Panim Paniya Panjabi, Eastern Panjabi, Mirpur Panjabi, Western Pankhu Pannei Panytyima Pao Papapana Papar Papasena PapavÙ Papel Papi
Papiamentu Papitalai Papuma Parachi Parakan„ Paranan Parauk Parawen Pardhan Pardhi Pare ParecÌs Parenga P‰ri Parkwa Parsi Parsi-Dari Parya Pasemah Pashayi, Northeast Pashayi, Northwest Pashayi, Southeast Pashayi, Southwest Pashto, Central
Pashto, Northern Pashto, Southern Pasi Patamona Patani Patep Pathiya Patpatar Pattani Paulohi PaumarÌ Pawaia Pawnee Paynamar Pe Pear Pech Peere Pei Pekal Pela Pele-Ata Pelende Pemon PÊmono Penan, Eastern
Penan, Western Penang Sign Language Penchal Pendau Penesak Pengo Penrhyn Perai Pero Persian Sign Language Peruvian Sign Language Pesisir, Southern Petats Petjo PÊvÊ Pfaelzisch Phai Phake Phalura Phana' Phangduwali Phende Philippine
Sign Language Phimbi Phong-Kniang Phu Thai Phuan Phudagi Phuie Phula Phunoi Phuong Piamatsina Piame Piapoco Piaroa Picard Pidgin, Cameroon Pidgin, Nigerian Piemontese Pije Pijin Pilag· Pileni Pima Bajo Pimbwe Pinai-Hagahai Pingelapese Pini
Pinigura Pinji Pintiini Pintupi-Luritja Pinyin Pipil Pirah„ Piratapuyo Piru Pisabo Pitcairn-Norfolk Piti Pitjantjatjara Pitta Pitta Piu Piya-Kwonci Plains Indian Sign n Language Plautdietsch Playero Pnar Podena Pogolo Pohnpeian
Pokang· Poke Pokomo, Lower Pokomo, Upper P^koot Pol Polari Polci Polish Polish Sign Language Polonombauk Pom Pomo, Central Pomo, Southeastern Pomo, Southern Ponam Pongu Pongyong Ponosakan Pontic Popoloca, Coyotepec Popoloca, Mezontla
Popoloca, San Felipe Otlaltepec Popoloca, San Juan Atzingo Popoloca, San LuÌs Temalacayuca Popoloca, San Marcos Tlalcoyalco Popoloca, Santa InÈs Ahuatempan Popoluca, Highland Popoluca, Oluta Popoluca, Sayula Popoluca, Texistepec Poqomam, Central Poqomam,
Eastern Poqomam, Southern Poqomchi', Eastern Poqomchi', Western Porohanon Port Sandwich Port Vato Portuguese Portuguese Sign Language Potawatomi Pouye Powari Poyan·wa Prasuni Pray 3 Principense ProvenÂal Providencia Sign Language Psikye Pu Ko
Puari Pubian Puelche Puerto Rican Sign Language Puinave Pukapuka Pulaar Pulabu Pular Puluwatese Puma PumÈ Pumi, Northern Pumi, Southern Punan Aput Punan Bah-Biau Punan Batu 1 Punan Merah Punan Merap Punan Tubu Punu Puoc
Puragi Purari Purepecha Purepecha, Western Highland Purik Purubor· Purum Putai Putoh Putukwam Puyuma Pwaamei Pwapwa Pyapun Pyen Pyu Qabiao Q'anjob'al, Eastern Qaqet Qashqa'i Qawasqar Q'eqchi' Qiang, Northern Qiang, Southern Qimant
Quapaw Quebec Sign Language Quechan Quechua, Ambo-Pasco Quechua, Arequipa-La UniÛn Quechua, Ayacucho Quechua, Cajamarca Quechua, Cajatambo North Lima Quechua, Chachapoyas Quechua,
Chaupihuaranga Quechua, Chilean Quechua, Chincha Quechua, Chiqui·n Ancash Quechua, Corongo Ancash Quechua, Cusco Quechua, Eastern ApurÌmac Quechua, Huallaga Hu·nuco Quechua, Huamalies-Dos de Mayo Hu·nuco Quechua, Huaylas Ancash Quechua, Huaylla Wanca
Quechua, Jauja Wanca Quechua, Lambayeque Quechua, Margos-Yarowilca-Lauricocha Quechua, Napo Lowland Quechua, North Bolivian Quechua, North JunÌn Quechua, Northern Conchucos Ancash Quechua, Pacaraos Quechua, Panao Hu·nuco Quechua,
Puno Quechua, San MartÌn Quechua, Santa Ana de Tusi Pasco Quechua, Sihuas Ancash Quechua, South Bolivian Quechua, Southern Conchucos Ancash Quechua, Southern Pastaza Quechua, Yauyos Queyu Quichua, CalderÛn Highland Quichua, CaÒar Highland
Quichua, Chimborazo Highland Quichua, Imbabura Highland Quichua, Loja Highland Quichua, Northern Pastaza Quichua, Salasaca Highland Quichua, Santiago del Estero Quichua, Tena Lowland Quileute Quinqui Rabha Rade Rahambuu Rajbanshi Raji Rajong Rakahanga-
Manihiki Ralte Rama Ramoaaina Ramopa Rampi Ranau Rang Ranglong Rao Rapa Rapa Nui Rapoisi Rapting Rarotongan Rasawa Ratagnon Ratahan Rathawi Raute Ravula Rawa Rawang Rawas Rawat Rawo Razajerdi Reel Rejang
Reli Rembarunga Rembong Rempi Remun Rendille Rengao Rennell-Belona Rennellese Sign Language Repanbitip Rerau Rerep Reshe ResÌgaro Retta RÊunion Creole French Reyesano Riang Riang Riantana Ribun Rien
Rikbaktsa Ringgou Ririo Ritarungo Riung Roglai, Cacgia Roglai, Northern Roglai, Southern Rogo Roma Romam Romani, Balkan Romani, Baltic Romani, Carpathian Romani, Kalo Finnish Romani, Sinte Romani, Tavringer Romani, Vlax Romani, Welsh Romanian
Romanian Sign Language Romanian, Istro Romanian, Megleno Romano-Greek Romano-Serbian Romansch Romblomanon Rombo Romkun Ron Ronga Rongga Rongpo Ronji Roon Roria Rotokas Rotuman Roviana Rudbari Rufiji Ruga Rukai Ruma Rumu
Rundi Runga Rungus Rungwa Russian Russian Sign Language Rusyn Rutul Ruuli Ruund Rwa Rwanda Sa Sa'a Saafi-Saafi Saam Saami, Akkala Saami, Inari Saami, Kildin Saami, Lule Saami, North Saami, Pite Saami, Skolt Saami, South
Saami, Ter Saami, Ume Saaroa Saba Sa'ban SabanÍs Sabaot Sabu Sab„m Sadri Sadri, Oraon Saek Saep Safaliba Safeyoka Safwa Sagala Sagalla Saho Sahu Saint Lucian Creole French Saisiyat Sajalong Sajau Basap Sakachep Sakam Sakao Sakapulteko
Sakata Sake Sakirabi· Sala Salampasu Salar Salas Salchuq Saleman Saliba S·liba Salish, Southern Puget Sound Salish, Straits Sallands Salt-Yui Saluan, Coastal Saluan, Kahumamahon Salum·
Salvadoran Sign Language xSam Sama Sama, Central Sama, Pangutaran Sama, Southern Samarokena Samba Samba Daka Samba Leko Sambal, Botolan Sambal, Tin‡ Samberigi Samburu Samei Samo Samo, Matya Samo, Maya Samo, Southern
Samoan Samosa Sampang Samre Samtao Samvedi San Miguel Creole French Sanapan· Sandawe Sanga Sanga Sanggau Sangil Sangir Sangisari Sanglechi-Ishkashimi Sango Sango, Riverain Sangu Sangu Saniyo-Hiyewe Sansi Sanskrit Sansu Santa
Cruz Santali Sanum· Sanye Sa'och S„otomense Saparua SapÈ Sapo Saponi Saposa Sapuan Sar Sara Sara Dunjo Sara Kaba Saramaccan Sardinian, Campidanese Sardinian, Gallurese Sardinian, Logudorese Sardinian, Sassarese Sarikoli Sarli
Sarsi Sartang Sarua Sarudu Saruga Sasak Sasaru Satawalese SaterÈ-MawÈ Saterfriesisch Saudi Arabian Sign Language Sauk Saurashtra Sauri Sauria Paharia Sause Sausi Savara Savi Savosavo Sawai Saweru Sawi Sawila
Sawknah Saxon, Low Saxon, Upper Saya Scanian Scots Sea Island Creole English Seba Sebat Bet Gurage Seberuang Sebuyau Sechelt Secoya Sedang Sedoa Seeku Segai Segeju Seget Sehwi Seimat Seit-Kaitetu Sekani Sekapan Sekar Seke Seke Seki
Seko Padang Seko Tengah Sekpele Selako Selangor Sign Language Selaru Selayar Selee Selepet Selkup Selungai Murut Seluwasan Semai Semandang Semaq Beri Sembakung Murut Semelai Semendo Semimi Semnam Semnani Sempan Sena
Sena, Malawi Senaya Sene Seneca Sengele Senggi Sengo Sengseng Senoufo, Cebaara Senoufo, Djimini Senoufo, Mamara SÈnoufo, NanerigÈ Senoufo, Nyarafolo Senoufo, Palaka SÈnoufo, Senara Senoufo, Shempire SÈnoufo, SÌcÌtÈ Senoufo, Supyire Senoufo, Syenara
Senoufo, Tagwana Sentani Sentinel Sepa Sepa Sepen Sera Seraiki Serawai Serbian Sere Serer-Sine Seri Serili Serrano Serua Serudung Murut Serui-Laut Seselwa Creole French Seta
Setaman Seti Settla Sewa Bay Seze Sha Shabak Shabo Shahmirzadi Shahrudi Shakara Shall-Zwall Shamang Shama-Sambuga Shambala Shan Shanga Shangzhai Sharanahua Shark Bay Sharwa Shatt Shau Shawnee She Shehri Shekhawati Shekkacho
Sheko Shelta Shendu Sheni Sherbro Sherdukpen Sherpa Shi Shiki Shilluk Shina Shina, Kohistani Shipibo-Conibo Shixing Sholaga Shom Peng Shona Shoo-Minda-Nye Shor Shoshoni Shua Shuar Shubi Shughni Shumashti Shumcho
Shuswap Shuwa-Zamani Shwai Sialum Siamou Sian Siane Siang Siar-Lak Sibe Sibu Sicilian Sidamo Sie Sierra Leone Sign Language Sighu Sihan Sika Sikaiana Sikaritai Sikiana Sikkimese Sikule Sila Sileibi Silesian,
Upper Silimo Siliput Silopi Silt'e Simaa Simba Simbali Simbari Simbo Simeku Simeulue Simte Sinagen Sinasina Sinaugoro Sindang Kelingi Sindhi Sindhi Bhil Singapore Sign Language Singpho Sinhala Sininkere Sinsauru Sinyar Sio Siona Sipakapense
Sira Siri Siriano SirionÛ Sirmauri Siroi Sisaala, Tumulung Sisaala, Western Sissala Sissano Sivandi Siwai Siwi Siwu Sizaki Skagit Skou Slavey, North Slavey, South Slovak Slovakian Sign Language Slovenian Slovenian Slovenian,
Resian Snohomish So So SÙ So'a Sobei Soga Soi Sok Sokoro Soli Solong Solos Som Somali Somrai Somray Somyev Sonde Songa Songe Songhay Songhay, Koyra Chiini Songhay, Koyraboro Senni Songo Songomeno Songoora Sonha Sonia Soninke
Sonsorol Soo Sop Soqotri Sora Sorbian, Lower Sorbian, Upper Sori-Harengan Sorkhei Sorsogon, Masbate Sorsogon, Waray Sotho, Northern Sotho, Southern Sou South African Sign Language South West Bay Sowa Sowanda Spanish Spanish Sign Language
Spanish, Loreto-Ucayali Spiti Bhoti Spokane Squamish Sranan Sri Lankan Creole Malay Sri Lankan Sign Language Stellingwerfs Stieng, Budeh Stieng, Bulo Stod Bhoti Stoney Suabo Suarmin Suau Suba Subanen, Central Subanen, Northern Subanon, Kolibugan
Subanon, Western Subanun, Lapuyan Subi Sudest Suena Suga Suganga Sui Suki Suku Sukuma Sukur Sula Sulka Sulod Sulung Suma Sumariup Sumau Sumbawa Sumbwa Sumo-Mayangna Sunam Sunda Sungkai Sunwar Suoy Sur
Surajpuri Surbakhal Suri Surigaonon Sursurunga Suruahs Suruku Surui Surui do Par Suau Suguami Suundi Suwawa Suy Svan Swabian Swahili Swahili Congo Swati Swedish Swedish Sign Language Swiss-French Sign Language Swiss-German Sign

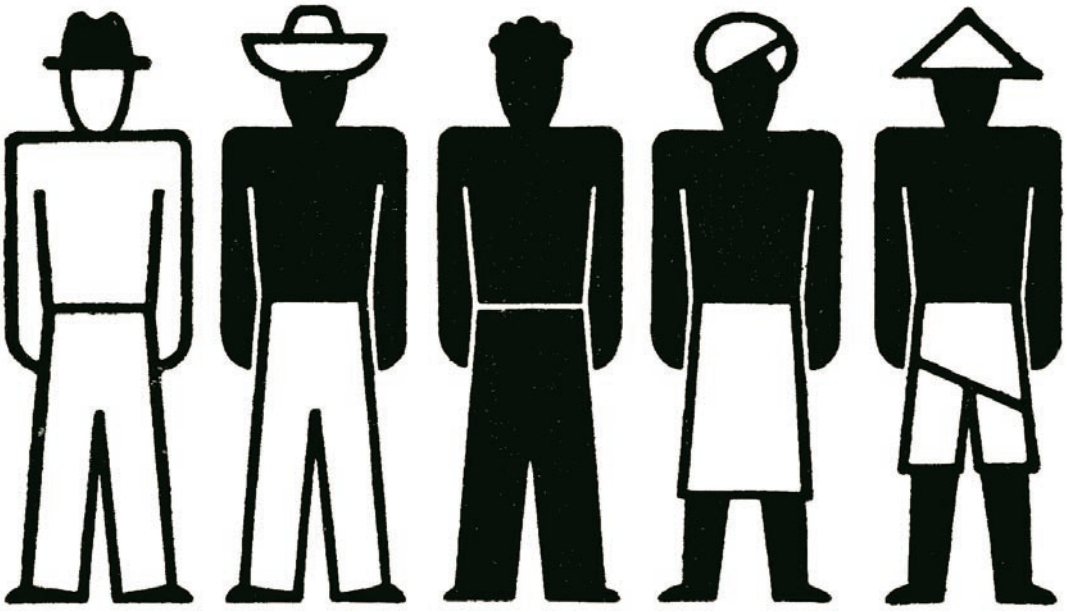
Lushootseed Lusi Lutos Luvale Luwati Luwo Luxembourgeois Luyana Luyia Lwalu Lyele Lyons Sign Language Ma Ma Maaka Ma'anyan Maasai Maay Maba Mabaale Mabire Maca Macaguán Macanese Macedonian
Machame Machiguenga Machinere Machinga Maco Macuna Macushi Mada Mada Madagascar Sign Language Madak Madang Maden Madi Ma'di Ma'di, Southern Madngele Madura Mae Maewo, Central Mafa Mafea Magahat Magahi Magar, Eastern Magar, Western M·ghdÎ Magoma Magori Maguindanao Mahali Mahei Mahongwe Mahou Mai Brat Maia Maiadomu Maiani Maidu, Northeast Maidu, Northwest Maii Mailu Maindo Mainfr‰nkisch Mairasi Maisin Maithili Maiwa Maiwa
Maiwala Majang Majera Majhi Majhwar Mak Mak Makaa Makasae Makasar Makayam Makhuwa Makhuwa-Marrevone Makhuwa-Meetto Makhuwa-Moniga Makhuwa-Saka Makhuwa-Shirima Makian, East Makian, West Maklew Makolkol Makonde M·ku
Maku'a Makur·p Makwe Mal Mal Paharia Mala Mala Mala Malasar Malaccan Creole Malay Malaccan Creole Portuguese Malagasy, Antankarana Malagasy, Bara Malagasy, Masikoro Malagasy, Northern Betsimisaraka Malagasy, Plateau Malagasy, Sakalava Malagasy,
Southern Betsimisaraka Malagasy, Tandroy-Mahafaly Malagasy, Tanosy Malagasy, Tsimihety Malakhel Malalamai Malango Malankuravan Malapandaram Malaryan Malas Malasanga Malavedan Malay Malay, Ambonese Malay, Baba Malay, Bacanese Malay,
Balinese Malay, Banda Malay, Berau Malay, Bukit Malay, Cocos Islands Malay, Jambi Malay, Kedah Malay, Kota Bangun Kutai Malay, Kupang Malay, Makassar Malay, Manado Malay, North Moluccan Malay, Pattani Malay, Sabah Malay,
Tenggarong Kutai Malayalam Malayic Dayak Malaynon Malayo Malaysian Sign Language Maldivian Male Male Malecite-Passamaquoddy MalÊku Jaìka Maleng Maleu-Kilenge Malfaxal Malgbe Mali Maligo Malila Malimba Malimpung Malinguat Malo Malol
Maltese Maltese Sign Language Malua Bay Malvi Mam, Central Mam, Northern Mam, Southern Mam, Tajumulco Mam, Todos Santos Cuchumat·n Mama Mamaa Mamanwa Mamasa Mambae Mambai Mambila,
Cameroon Mambila, Nigeria Mamboru Mambwe-Lungu Mampruli Mamuju Mamusi Mamvu Man Met Manam Manambu Manangba Manchu Manda Manda Manda Mandahuaca Mandaic Mandan Mandandanyi Mandar Mandara Mandari
Mandaya, Cataelano Mandaya, Karaga Mandaya, Sangab Mandeali Mander Mandinka Mandjak Mandobo Atas Mandobo Bawah Manem Mang Mangarayi Mangareva Mangas Mangayat Mangbetu Mangbutu Mangerr Manggarai Mango Mangole Mangseng
Manikion Maninka, Forest Maninka, Konyanka Maninka, Sankaran Maninkakan, Eastern Maninkakan, Kita Maninkakan, Western Manipa Mankanya Mann Manna-Dora Mannan Manobo, Agusan Manobo, Ata Manobo, Cinamiguin Manobo, Cotabato Manobo, Dibabawon
Manobo, Ilianen Manobo, Matigsalug Manobo, Obo Manobo, Rajah Kabunsuwan Manobo, Sarangani Manobo, Western Bukidnon Manombai Mansaka Mansi Mansoanka Manta Mantsi Manusela Manx Manya Manyawa Manyika Manza
Maonan Maori Mape Mapena Mapia Mapidian Mapoyo Mapudungun Mapun Maquiritari Mara Maraghei Maragus Marakwet, Northern Marakwet, Southern Maramba Maranao Marangis Maranunggu Mararit Marathi Marau Marba Maremgi Marenje
Marfa Margany Marghi Central Marghi South Margu Mari Mari Mari, Eastern Mari, Western Maria Maria Maria, Dandami Maricopa Maridan Maridjabin Marik Marimanindji Marind Marind, Bian Maring Maringarr Marino Mariri Marithiel Maritime
Sign Language Mariyedi Marka Marovo Marquesan, North Marquesan, South Marshallese Marti Ke Martu Wangka Martuyhunira Mar'bo Marwari Marwari Masaaba Masalit Masana Masbatenyo Masela, Central Masela, East Masela, West Mashco Piro Mashi
Mashi Masimasi Masiwang Maskelynes Maskoy Pidgin Maslam Masmaje Massalat Massep Matal Matbat Matengo Matepi Matìs Matlatzinca, Atzingo Matlatzinca, San Francisco Mato MatsÊs
Matukar Matumbi Maung Mauwake Mawa Mawak Mawan Mawayana Mawchi Mawes Maxakalí Ma'ya Maya, Chan Santa Cruz Maya, Mop·n Maya, Yucat·n Mayaguduna Mayeka Mayo Mayogo Mazagway Mazahua Central Mazahua, Michoac·n Mazanderani
Mazatec, Ayautla Mazatec, Chiquihuitl·n Mazatec, Huautla Mazatec, Ixcatl·n Mazatec, Jalapa de Díaz Mazatec, Mazatl·n Mazatec, San JerÚnimo TecÛatl Mazatec, Soyaltepec Mba Mbabaram Mbala Mbalanhu Mbandja Mbangala Mbangi Mbangwe Mbara
Mbariman-Gudhinma Mbati Mbato Mbay Mbe Mbedam Mbelime Mbembe, Cross River Mbembe, Tigon Mbere Mbesa Mbo Mbo Mbo' Mboi Mboko Mbole Mbonga Mbongno Mbore Mbosi Mbo-Ung Mbowe Mbre Mbu'
Mbugu Mbugwe Mbuko Mbukushu Mbula Mbula-Bwazza Mbule Mbulungish Mbum Mbunda Mbundu Mbunga Mburku Mbwela Mea Medebur Media Lengua Mediak Medumba Me'en Mefele Megam Mehek Mehin·ku Mehri Meitei Mekeo Mekmek
Mekwei Melanau Mele-Fila Melo Melpa Memoni Mendankwe-Nkwen Mende Mende Mengaka Mengen Mengisa Menka Menominee Mentawai Menya Meohang, Eastern Meohang, Western
Meoswar Mer Meramera Merei Merey Meriam Merlav Meru Merwari Mesaka Mese Mesme Mesqan Mesquakie Meta' Mewari Mewati Mexican Sign Language Meyah Mfinu Mfumte Mian Miani Miarr„ Michif Micmac Midob Migaama Migabac Miju-
Mishmi Mikasuki Miltu Mimi Mina Mina Minangkabau Minanibai Minaveha Mindiri Mingang Doso Mingrelian Minidien Minigir Minokok Minriq Mintil Miranadese Mire Mirgan Miri Miriwung Miship Misima-Paneati MÌskito Mituku Miu Miwa Miwok,
Central Sierra Miwok, Lake Miwok, Northern Sierra Miwok, Plains Miwok, Southern Sierra Mixe, Coatl·n Mixe, Isthmus Mixe, Juquila Mixe, Mazatl·n Mixe, North Central Mixe, Quetzaltepec Mixe, Tlahuitoltepec Mixe, Totontepec Mixifore Mixtec, Alacatlatzala Mixtec,
Alcozauca Mixtec, Amoltepec Mixtec, Apasco-Apoala Mixtec, Atatl·huca Mixtec, Ayutla Mixtec, Cacaloxtepec Mixtec, Chayuco Mixtec, Chazumba Mixtec, Chigmecatitl·n Mixtec, Coatzospan Mixtec, Cuyamecalco Mixtec, Diuxi-Tilantongo Mixtec, Huitepec
Mixtec, Itundujia Mixtec, Ixtayutla Mixtec, Jamiltepec Mixtec, Juxtlahuaca Mixtec, Magdalena PeÔasco Mixtec, MetlatÛnoc Mixtec, Mitlatongo Mixtec, Mixtepec Mixtec, Northern Tlaxiaco Mixtec, Northwest Oaxaca Mixtec, Ocotepec Mixtec, PeÔoles Mixtec, Pinotepa
Nacional Mixtec, San Juan Colorado Mixtec, San Juan Teita Mixtec, San Miguel el Grande Mixtec, San Miguel Piedras Mixtec, Santa Lucìa Monteverde Mixtec, Santa Marìa Zacatepec Mixtec, Silacayoapan Mixtec, Sindihui
Mixtec, Sinicahua Mixtec, Southeastern Nochixtl·n Mixtec, Southern Puebla Mixtec, Southwestern Tlaxiaco Mixtec, Soyaltepec Mixtec, Tacahua Mixtec, Tamazola Mixtec, Tezoatl·n Mixtec, Tida· Mixtec, Tijaltepec Mixtec, Tlazoyaltepec Mixtec, Tututepec Mixtec, Western
Juxtlahuaca Mixtec, Yoloxochitl Mixtec, Yosond`a Mixtec, YucuaÔe Mixtec, Yutanduchi Miya Miyako Miyobe Mizo Mlabri Mlap Mlomp Mmaala Mmen Mnong, Central Mnong, Eastern Mnong, Southern Moba MÛcheno Mochi Mocho Mocovì Mo'da Modang
Modole Moere Mofu, North Mofu-Gudur Mogholi Mogum Mohave Mohawk Moi Moi Moikodi Moinba Moingi Mok Moken Mokerang Mokilese Moklen Mokole Mokpwe Moksha Molbog Moldova Sign Language Molengue Molima Molo Molof
Moloko Mom Jango Moma Momare Mombum Momina Momuna Mon Monastic Sign Language MondÈ Mondropolon Mongol Mongolian Sign Language Mongolian, Halh Mongolian, Peripheral Mongondow Mongo-Nkundu Moni Mono Mono Mono Mono Monom
Monpa, Kalaktang Monpa, Tawang Montagnais Montol Monumbo Monzombo Moo MÚorÈ Mor Mor Moraid Morawa Morerebi Moresada Mori Atas Mori Bawah Morigi Morisyen Moro Moroccan Sign Language Morokodo Morom
Moronene Morori Morouas Mortlockese Moru Mosimo Mosina Mosiro Moskona Mota Motlav Motu Motu, Hiri Mouk-Aria Movima Mozambican Sign Language Mpade Mpi Mpiemo Mpongmpong Mpoto Mpotovoro Mpuono Mpur Mru Mser Mualang Mubami
Mubi Mudbura Muduapa Muduga Mufian Mugom Muinane Mukha-Dora Muko-Muko Mukulu Mulam Mullukmulluk Muluridyi Mum Mumuye Muna Mundabli Mundang Mundani Mundari Mundat M¸nd¸ Munduruk` Mungaka Munggui Mungkip Muniche
Munit Munji Munsee Muong Muratayak Muria, Eastern Muria, Far Western Muria, Western Murik Murkim Murle Murrinh-Patha Mursi Murupi Muruwari Musak Musan Musar Musasa Musey Musgu Mushungulu Musi Muskogee Musom Mussau-Emira
Muthuvan Mutu Muya Muyang Muyu, North Muyu, South Muyuw Mvanip Mvuba Mwaghavul Mwan Mwani Mwatebu Mwera Mwera Mwimbi-Muthambi Myene N/u Na Naaba Naasioi Naba Nabak Nabi Nachering Nadìb Nafaanra Nafi Nafri Nafusi
Naga Pidgin Naga, Angami Naga, Ao Naga, Chang Naga, Chokri Naga, Chothe Naga, Inpui Naga, Kharam Naga, Khezha Naga, Khiamniungan Naga, Khoibu Naga, Konyak Naga, Liangmai Naga, Lotha Naga, Mao Naga, Maram Naga,
Maring Naga, Monsang Naga, Moyon Naga, Mzieme Naga, Nocte Naga, Northern Rengma Naga, Phom Naga, Pochuri Naga, Poumei Naga, Puimei Naga, Purum Naga, Rongmei Naga, Sangtam Naga, Southern Rengma Naga, Sumi Naga, Tangkhul Naga, Tarao Naga, Tase
Naga, Thangal Naga, Tutsa Naga, Wancho Naga, Yimchungru Naga, Zeme Nagarchal Nage Nahali Nahari Nahuatl, Central Nahuatl, Central Huasteca Nahuatl, Central Puebla Nahuatl, Coatepec Nahuatl, Durango
Nahuatl, Eastern Huasteca Nahuatl, Guerrero Nahuatl, Highland Puebla Nahuatl, Huaxcaleca Nahuatl, Isthmus-Cosoleacaque Nahuatl, Isthmus-Mecayapan Nahuatl, Isthmus-Pajapan Nahuatl, Michoac·n Nahuatl, Morelos Nahuatl, Northern Oaxaca
Nahuatl, Northern Puebla Nahuatl, Ometepec Nahuatl, Orizaba Nahuatl, Santa Marìa la Alta Nahuatl, Sierra Negra Nahuatl, Southeastern Puebla Nahuatl, Temascaltepec Nahuatl, Tetelcingo Nahuatl, Tlalitzlipa Nahuatl, Tlamacazapa Nahuatl, Western Huasteca Nahuatl,
Zacatl·n-Ahuacatl·n-Tepetzintla Nai Naka'ela Nakai Nakama Nakanai Nakara Nake Naki Nakwi Nalca Nali Nalik Nalu Nama Nama Namakura Namat Nambas, Big Nambiku·ra, Northern Nambiku·ra, Southern Nambo Nambya N··Meo Namia Namiae
Namibian Sign Language Namo Namonuito Namosi-Naitasiri-Serua Namuyi Nanai Nancere Nande Nanggu Nangikurrunggurr Nankina Nanti Napoletano-Calabrese Napu Nar Phu Nara Narak Narango Narau Narim Naro Narom
Nasarian Naskapi Natanzi Nateni Nathembo Natioro Nauete Nauna Nauruan Navajo Navut Nawaru Nawdm Nawuri Naxi Nayi Nayini Ncane Nchumbulu Ndai Ndaka Ndaktup Ndali Ndam Ndamba Nda'nda' Ndasa Ndau Ndebele Ndebele Nde-Gbite
Ndemli Ndendeule Ndengereko Nde-Nsele-Nta Nding Ndo Ndobo Ndoe Ndogo Ndolo Ndom Ndombe Ndonde Hamba Ndonga Ndoola Nduga Ndumu Ndun Ndunda Ndunga Ndut Ndyuka-Trio Pidgin Nedebang Nefamese Negeri Sembilan Malay
Negidal Nehan Nek Nekgini Neko Neku Neme Nemi Nen Nend Nenets Nengone Nepalese Sign Language Nepali Nete New Zealand Sign Language Newar Neyo Nez Perce Nga La Ngaanyatjarra Ng‰bere Ngad'a Ngad'a,
Eastern Ngadjunmaya Ngaing Ngaju Ngala Ngalakan Ngalkbun Ngalum Ngam Ngamambo Ngambay Ngamini Ngamo Nganasan Ngando Ngando Ngandyera Ngangam Ngarinman Ngarinyin Ngarla Ngarluma Ngas Ngasa Ngatik Men's Creole Ngawun
Ngbaka Ngbaka Ma'bo Ngbaka Manza Ngbandi, Northern Ngbandi, Southern Ngbinda Ngbundu Ngelima Ngemba Ngeq Ngete Nggem Nggwahyi Ngie Ngiemboon Ngile Ngindo Ngiti
Ngizim Ngom Ngomba Ngombale Ngombe Ngombe Ngong Ngongo Ngoni Ngoreme Ngoshie Ngul Ngulu Nguluwan Ngumba Ngumbi Ngundi Ngundu Ngungwel NguÙn Ngura Ngurmbur Ngwaba Ngwe Ngwo Nhengatu Nhuwala Nias
Nicaragua Creole English Nicaraguan Sign Language Nicobarese, Car Nicobarese, Central Nicobarese, Southern Niellim Nigerian Sign Language Nihali Nii Nijadali Niksek Nila Nilamba Nimadi Nimanbur Nimboran Nimi Nimo Nimoa Ninam Nindi Ningera

Inuktitut, Eastern Canadian Inuktitut, Greenlandic Inuktitut, Western Canadian Inupiatun, North Alaskan Inupiatun, Northwest Alaska Ipeka-Tapuia Ipiko Ipili Ipulo Iquito Ir Ir-ntxe Iranun Iraqw Irarutu Iraya Iresim Irigwe Irish Sign Language Irula Isabi Isanzu Isconahua Isebe Isekiri Isinai Isirawa Islander Creole English Isnag Isoko Israeli Sign Language Istriot Isu Isu Italian Italian Sign Language Itawit Itelmen Iteri Itik Itneg, Adasen Itneg, Banao Itneg, Binongan Itneg, Inlaod Itneg, Maeng Itneg, Masadiit Itneg, Moyadan Ito Itonama Itu Mbon Uzo Itutang Itza' Iu Mien Ivatan Ivbie North-Okpela-Arhe Iwaidja I-Wak Iwal Iwam Iwam, Sepik Iwur Ixcatec Ixil, Chajul Ixil, Nebaj Ixil, San Juan Cotzal Iyayu Iyive Iyo Izere Izi-Ezaa-Ikwo-Mgbo Izon Izora Jabutî Jad Jadgali Jagoi Jah Hut Jahanka Jakalteko, Eastern Jakalteko, Western Jakati Jakun Jalkunan Jalunga Jamaican Country Sign Language Jamaican Creole English Jamamadî Jamtska Jandavra Jangshung Janji Japanese Japanese Sign Language Japreria Jaqaru Jara Jarai Jarawa Jarawa Jarnango Jaru Jaru-ra Jaunsari Javanese Javanese, Caribbean Javanese, New Caledonian Jawe Jaya Jebero Jeh Jehai Jemez Jeng Jere Jeri Kuo Jerung Jiamao Jiarong Jiba Jibu Jiiddu Jilbe Jilim Jimi Jimi Jina Jingpho Jinuo, Buyuan Jinuo, Youle Jirel Jiru Jita Jju Joba Jola-Fonyi Jola-Kasa Jonkor Bourmataguil Jordanian Sign Language Jorto Jowulu Ju Ju/'hoan Juang Judeo-Berber Judeo-Georgian Judeo-Italian Judeo-Tat Jukun Takum Jula J`ma Jumjum Jumli Jur Modo Juray Jur`na Jutish Juwal Jwira-Pepesa Kaamba Kaan Kaansa Kaba Kaba Deme Kaba Na Kabalai Kabardian Kabatei Kabixî Kabiyè Kabola Kaburi Kabutra Kabuverdianu Kabwa Kabwari Kabyle Kachama-Ganjule Kachari Kachchi Kacipo-Balesi Kaco' Kadai Kadar Kadara Kadaru Kadazan, Coastal Kadazan, Klias River Kadazan, Labuk-KinabatanganKadiwÊu Kado Kaduo Kafa Kafoa Kagate Kagayanen Kag-Fer-Jiir-Koor-Ror-Us-Zuksun Kagoma Kagoro Kagulu Kahayan Kahe Kahua Kaibobo Kaidipang Kaiep Kaikadi Kaike Kaiku Kaili, Da'a Kaili, Ledo Kaili, Unde Kaimbulawa Kaing-ng Kairak Kairiru Kairui-Midiki Kais Kaivi Kaiw· Kaiy Kajakse Kajali Kajaman Kakabai Kakabe Kakanda Kaki Ae Kakihum Kako Kakwa Kala Lagaw Ya Kalabakan Kalabari Kalabra Kalagan Kalagan, Kagan Kalagan, Tagakaulu Kalam Kalami KalamsÊ Kalanadi Kalanga Kalao Kalapuya Kalasha Kalenjin Kalinga, Butbut Kalinga, Limos Kalinga, Lower Tanudan Kalinga, Lubuagan Kalinga, Mabaka Valley Kalinga, Madukayang Kalinga, Southern Kalinga, Upper Tanudan Kalispel-Pend D'oreille Kalkoti Kallahan, Kayapa Kallahan, Keley-I Kallahan, Tinoc Kalmyk-Oirat Kalou Kaluli Kalumpang Kam Kamang Kamano Kamantan Kamar Kamara Kamarian Kamaru Kamasa Kamasau Kamayo Kamayur· Kamba Kambaata Kambaira Kambera Kamberau Kami Kami Kamo Kamoro Kamu Kamula Kamviri Kamwe Kanakanabu Kanamarî Kanashi Kanasi Kanauji Kandas KandawoKande Kanembu Kang Kanga Kangean Kanggape Kangjia Kango Kango Kangri Kanikkaran Kaningdon-Nindem Kaningi Kaningra Kaninuwa Kanite Kanjari Kanju Kankanaey Kankanay, Northern Kannada KanoÊ Kanowit Kansa Kantosi Kanu Kanufi Kanum, B‰di Kanum, Ngk,lmpw Kanum, Sm‰rky Kanum, Sota Kanuri, Bilma Kanuri, Central Kanuri, Manga Kanuri, Tumari Kanyok Kao Kaonde Kapin Kapingamarangi Kapori Kapriman Kapya Kaqchikel, Akatenango Southwestern Kaqchikel, Central Kaqchikel, Eastern Kaqchikel, Northern Kaqchikel, Santa Marìa de Jes`s Kaqchikel, Santo Domingo Xenacoj Kaqchikel, South Central Kaqchikel, Southern Kaqchikel, Western Kaqchikel, Yepocapa Southwestern Kaqchikel-K'iche' Mixed Language Kara Kara Kara Karaboro, Eastern Karaboro, Western Karachay-Balkar Karadjeri Karagas Karahawyana Karaim Karaj· Karakalpak Karamojong Karang Karanga Karao Karas Karata Karawa Karbi Kare Kare Karekare Karelian Karen, Brek Karen, Bwe Karen, Geba Karen, Geko Karen, Lahta Karen, Manumanaw Karen, Paku Karen, Pa'o Karen, Phrae Pwo Karen, Pwo Eastern Karen, Pwo Northern Karen, Pwo Western Karen, S'gaw Karen, Yinbaw Karen, Yintale Karen, Zayein Karey Kari Karingani Karipuna Karip`na Creole French Kariti,na Kariya Karkar-Yuri Karko Karnai Karo Karo Karok Karolanos Karon Karon Dori Karore Kasanga Kasem Kashaya Kashinawa Kashmiri Kashubian Kasiguranin Kaska Kasseng Kasua Kataang Katawixi Katbol Katcha-Kadugli-Miri K,te Kati Katingan Katkari Katla Katu, Eastern Katu, Western Katua Katukìna Katukìna, Panoan Kaulong Kaur Kaure Kauwera Kavalan Kavet Kawacha Kawaiisu Kawe Kaxararî Kayabî Kayagar Kayah, Eastern Kayah, Western Kayan Kayan Kayan Mahakam Kayan, Baram Kayan, Busang Kayan, Kayan River Kayan, Mendalam Kayan, Murik Kayan, Rejang Kayan, WahauKayapÛ Kayardild Kayeli Kayong Kayort Kaytetye Kayu Agung Kayupulau Kazakh Keapara Kedang Keder Kehu Kei Keiga Kein Kela Kela Kelabit Kele Kele KÈlÈ Keliko Kelo Kelon Kemak Kembayan Kemberano Kembra Kemezung Kemiehua Kemtuik Kenati Kendayan Kendeje Kendem Kenga Keningau Murut Keninjal Kensiu Kenswei Nsei Kenuzi-Dongola Kenyah, Bahau River Kenyah, Bakung Kenyah, Kayan River Kenyah, Kelinyau Kenyah, Mahakam Kenyah, Sebob Kenyah, Tutoh Kenyah, Upper Baram Kenyah, Wahau Kenyah, Western Kenyan Sign Language Kenyang Kenyi Ke'o Keoru-Ahia Kepo' Kera Kerak Kereho Kerek Keres, Eastern Keres, Western Kerewe Kerewo Kerinci Kesawai Ket Kete Ketengban Ketum Kewa, East Kewa, West Keyagana Kgalagadi Khakas Khalaj Khalaj, Turkic Khaling Kham, Eastern Parbate Kham, Gamale Kham, Sheshi Kham, Western Parbate Khamba Khamti Khamyang Khana Khandesi Kh·ng Khanty Khao Kharia Kharia Thar Khasi Khe Khehek Khengkha Khetrani Khinalugh Khirwar Khisa Khlor Khmer, Central Khmer, Northern Khmu Kho'ini Kholok Khorasani Turkish Khowar Khua Khuen Kh,n Khunsari Khvarshi Khwe Kibet Kibiri K'iche', Central K'iche', CunÈn K'iche', Eastern K'iche', Joyabaj K'iche', San AndrÈs K'iche', West Central Kickapoo Kikai Kilivila Kiliwa Kilmeri Kim Kim Mun Kimaama Kimaragang Kimbu Kimki KimrÈ Kinabatangan, Upper Kinalakna Kinaray-A Kinga Kinnauri Kinnauri, Bhoti Kinnauri, Chitkuli Kinnauri, Harijan Kintaq Kinuku Kioko Kiong Kiorr Kiowa Kiput Kir-Balar Kire Kiribati Kirike Kirikiri Kirmanjki Kis Kisankasa Kisar Kisi Kisi, Southern Kissi, Northern Kistane Kitja Kituba Kituba Kiwai, Northeast Kiwai, Southern Klamath-Modoc Klao Ko Koalib Koasati Koba Kobiana Kobol Kobon Koch Koda Kodava Kodeoha Kodi Kodia Koenoem Kofa KofeiKofyar Kohin Kohistani, Indus Koho Kohoroxitari Kohumono Koi Koiali, Mountain Koiari, Grass Koireng Koitabu Koiwat Kok Borok Kokata Koke Kokoda Kokola Kokota Kol Kol Kola Kolami, Northwestern Kolami, Southeastern Kolbila Koli, Kachi Koli, Parkari Koli, Wadiyara Kolom K~lsch Koluwawa Kom Kom Koma Komba Kombai Kombio Komering Kominimung Komi-Permyak Komi-Zyrian Komo Komo Komodo Kompane Komso Komyandaret Kon Keu Konai Konda Konda-Dora Koneraw Kongo, San Salvador Konjo Konjo, Coastal Konjo, Highland Konkani Konkani, Goan Konkomba Konni Kono Kono Kono Konomala Konongo Koongo Koonzime Koorete Kopar Kopkaka Korafe Koraga, Korra Koraga, Mudu Korak Koraku Korandje Korean Korean Sign Language Koreguaje Koresh-e Rostam Korku Korlai Creole Portuguese Koro Koro Koro KoromfÊ Koromira Koroni Korop Koroshi Korowai Korowai, North Korubo Korupun-Sela Korwa Koryak Kosadle Kosena Koshin Kosraean Kota Kota Kota Marudu Talantang Kota Marudu Tinagas Koti Kouya Kovai Kove Kowaki Kowiai Koy Sanjaq Surat Koya Koyaga Koyo Koyukon Kpagua Kpala Kpan Kpasam Kpatili Kpelle, Guinea Kpelle, Liberia Kpessi Kplang Krache Krahn, Eastern Krahn, Western KrahÙ Kraol Krenak Kreye Krim Krimchak Krinkati-Timbira Krio Kriol Krisa Krobu Krongo Krui Krumen, Plapo Krumen, Pye Krumen, Tepo Kru'ng 2 Kryts Kua Kuan Kuanhua Kuanua Kube Kubo Kubu Kudiya Kudmali Kudu-Camo Kugama Kugbo Kuhane Kui Kui Kuijau Kuik`ro-Kalap·lo Kujarge Kuk Kukatja Kukele Kukna Kuku-Mangk Kuku-Mu'inh Kuku-Muminh Kuku-Ugbanh Kuku-Uwanh Kuku-Yalanji Kula Kulango, Bondoukou Kulango, Bouna Kulere Kulfa Kulisusu Kulon-Pazeh Kulung Kulung Kumak Kumalu Kumam Kuman Kumaoni Kumarbhag Paharia Kumba Kumbainggar Kumbaran Kumbewaha Kumhali Kumiai Kumukio Kumyk Kumzari Kuna, Border Kuna, San Blas Kunama Kunbarlang Kunda Kunduvadi Kunfal Kung Kung-Ekoka Kunggara Kunggari Kuni Kuni-Boazi Kunigami Kunimaipa Kunja Kunjen Kunyi Kuo Kuot Kupa Kupia Kupsabiny Kur Kurama Kuranko Kurdish, Central Kurdish, Northern Kurdish, Southern Kuri Kuria Kurichiya Kurmukar Kurrama Kurti Kurtokha Kuru-ya Kurudu Kurumba, Alu Kurumba, Attapady Kurumba, Betta Kurumba, Jennu Kurumba, Kannada Kurumba, Mullu Kurux Kurux, Nepali Kusaal Kusaghe Kuskokwim, Upper Kusu Kutenai Kutep Kuthant Kutto Kutu Kuturmi Kuuku-Ya'u Kuvi Kuwaa Kuwaataay Kuy Kwa Kwa' Kwaami Kwaio Kwaja Kwak Kwakiutl Kwakum Kwama Kwambi Kwamera Kwami Kwang Kwanga Kwangali Kwanja Kwanyama Kwara'ae Kwato Kwaya Kwaza Kwegu Kwer Kwerba Kwerba Mamberamo Kwere Kwerisa Kwese Kwesten Kwini Kwinti Kwoma Kwomtari Kyak Kyaka Kyenele Kyenga Kyerung Kyrgyz Laal Laari Laba Label La'bi Labir Labo Labu Lacandon Lachi Lachi, White Ladakhi Ladin Ladino Laeko-Libuat Lafofa Laghu Laghuu Lagwan Laha Laha Lahanan Lahu Lahu Shi Laimbue Laiyolo Lak Laka Laka Lakalei Lakha Laki Lakkia Lakona Lakota Lala Lala-Bisa Lala-Roba Lalia Lama Lama Lamaholot Lamalera Lamam Lamang Lamatuka Lamba Lambadi Lambichhong Lamboya Lambya Lame Lamenu Lamet Lamja-Dengsa-Tola Lamkang Lamma Lamnso' Lamogai Lampung Lamu-Lamu Landoma Langam Langbashe Langi Lango Lango Languedocien Lanoh Lao Laopang Laos Sign Language Lara' Laragia Lardil Larevat Lari Larike-Wakasihu Laro Larteh Laru Lasalimu Lasgerdi Lashi Lasi Latin Latu Latvian Latvian Sign Language Lau Laua Lauan Lauje Laura Lavatbura-Lamusong Lave Laven Lavukaleve Lawa, Eastern Lawa, Western Lawangan Lawunuia Layakha Laz Leco Leelau Lefa Lega-Mwenga Lega-Shabunda Legbo Legenyem Lehali Lehalurup Lehar Leipon Lelak Lele Lele Lele Lele Lelemi Lelepa Lematang Lembak Lembata, South Lembata, West Lembena Lemio Lemolang Lemoro Lenakel Lenca Lendu Lengilu Lengo Lengola Lengua Lenje Lenkau Lenyima Lepcha Lepki Lere Lese Lesing-Gelimi Letemboi Leti Leti Levuka Lewo Lewo Eleng Lewotobi Leyigha Lezgi Lhao Vo Lhokpu Lhomi Liabuku Liana-Seti Liberian English Libido Libinza Libyan Sign Language Ligbi Ligenza Ligurian Lihir Lijili Lika Liki Likila Likuba Likum Likwala Lilau Lillooet Limassa Limba, East Limba, West-Central Limbu Limbum Limburgisch Limilngan Limousin Lindu Lingala Lingao Lingarak Lingkhim Lintang Li'o Lipo Lisabata-Nuniali Lisela Lish Lish-n Did·n Lishana Deni Lishanid Noshan Lisu Lithuanian Lithuanian Sign Language Litzlitz Liv Livvi Loarki Lobala Lobi Lobu, Lanas Lobu, Tampias Lodhi Logba Logo Logol Logooli Logorik Lohar, Gade Lohar, Lahul Lokaa Loko Lokoya Lola Lolak Lole Lolo Loloda Lom Loma Loma Lomaiviti Lomavren Lombard Lombi Lombo Lomwe Lomwe, Malawi Loncong Longgu Longto Longuda Loniu Lonwolwol Lonzo Loo Lopa Lopi Lopit Lorang Loredjakarkar Lorung, Northern Lorung, Southern Lote Lotud Lou Louisiana Creole French Loun Lowa Lozi L, Lua' Luang Luba-Kasai Luba-Katanga Lubila Lubu Luchazi Lucumi Ludian Lufu Lugbara Luguru Luhu Lui Luimbi LuiseÒo Lukpa Lumba-Yakkha Lumbu Lumun Luna Lunanakha Lunda Lundayeh Lungga Luo Luo Luri Luri, Northern Luri, Southern Lusengo

Daai Chin, Falam Chin, Haka Chin, Khumi Chin, Khumi Awa Chin, Mara Chin, Mro Chin, Ngawn Chin, Paite Chin, Senthang Chin, Siyin Chin, Tawr Chin, Thado Chin, Zotung Chinali
Chinantec, Chiltepec Chinantec, Comaltepec Chinantec, Lalana Chinantec, Lealao Chinantec, Ojitl·n Chinantec, Ozumacín Chinantec, Palantla Chinantec, Quiotepec Chinantec, Sochiapam Chinantec, Tepetotutla Chinantec, Tepinapa Chinantec, Tlacoatzintepec Chinantec, Usila Chinantec, Valle Nacional Chinese Pidgin English Chinese Sign Language Chinese, Gan Chinese, Hakka Chinese, Huizhou Chinese, Jinyu Chinese, Mandarin Chinese, Min Bei Chinese, Min Dong Chinese, Min Nan Chinese, Min Zhong Chinese, Pu-Xian Chinese, Wu Chinese, Xiang Chinese, Yue Chinook Chinook Wawa Chipaya Chippewa Chiquitano Chiru Chittagonian Chocangacakha Chochotec Choctaw Chodri Chokwe Chol, Tila Chol, Tumbal· Chong Choni Chontal, Highland Oaxaca Chontal, Lowland Oaxaca Chontal, Tabasco Chonyi Chopi Chorote, Iyojwa'ja Chorote, Iyo'wujwa Ch'orti' Chrau Chru Chuave Chug Chuj, Ixtat·n Chuj, San Sebasti·n Coat·n Chuka Chukot Chukwa Chulym Chumburung Churahi Chut Chuukese Chuvash Chuwabu Cia-Cia Cibak Cimbrian Cinda-Regi-Tiyal Cineni Cinta Larga Cishingini Citak Citak, Tamnim Ciwogai Clallam C'lela Cocama-Cocamilla Cocopa Coeur d'Alene Cof·n Cogui Colombian Sign Language Colorado Columbia-Wenatchi Comanche Como Karim Comorian Comorian, Mwali Comorian, Ndzwani Comorian, Ngazidja Comox Con CÙÙng Coos Cora, El Nayar Cora, Santa Teresa Cori Cornish Corsican Costa Rican Sign Language Cree, Moose Cree, Plains Cree, Swampy Cree, Woods Crimean Tatar Crioulo, Upper Guinea Croatia Sign Language Croatian Crow Cua Cuba Sign Language Cubeo Cuiba Cuicatec, Tepeuxila Cuicatec, Teutila Culina Cun Cung Curripaco Cutchi-Swahili Cuvok Cuyonon Czech Czech Sign Language Daantanai' Daasanach Daba Dabarre Dabe Dadibi Dadiya Daga Dagaare, Southern Dagaari Dioula Dagara, Northern Dagba Dagbani Dagik Dahalo Daho-Doo Dai Dair Daju, Dar Daju Daju, Dar Fur Daju, Dar Sila Dakaka Dakka Dakota Dakpakha Dalecarlian Dama Damal Damar, East Damar, West Dambi Dameli Dampelas Dan Danaru Danau Dangalẽat Dangme Dani, Lower Grand Valley Dani, Mid Grand Valley Dani, Upper Grand Valley Dani, Western Danish Danish Sign Language Dano Dao Daonda Darai Darang Deng Dargwa Dari, Zoroastrian Darkhat Darling Darlong Darmiya Daro-Matu Darwazi Dass Datooga Daur Davawenyo D,w Dawawa Dawera-Daweloor Day Dayak, Land Dayi Daza Dazaga Deccan Dedua Defaka Deg Degaru Degema Degenan Degexit'an Dehu Dehwari Dek Dela-Oenale Delo Dem Dema Demisa Demta Dendi Dendi Dene Dengese Dengka Denǐ DenoDenya Deori Dera Dera Desano Desiya Dewoin Dezfuli Dghwede Dhaiso Dhalandji Dhangu Dhanki Dhanwar Dhanwar Dhao Dhargari Dhatki Dhimal Dhodia Dhundari Dhuwal Dia Dibiyaso Dibo Dibole Dida, Lakota Dida, YocobouÈ Didinga Dido Digaro-Mishmi Digo Dii Dijim-Bwilim Dilling Dima Dimasa Dimbong Dime Dimir Dimli Ding Dinka, Northeastern Dinka, Northwestern Dinka, South Central Dinka, Southeastern Dinka, Southwestern Diodio Dirari Dirasha Diri Diriku Dirim Disa Ditammari Diuwe Dixon Reef Dizi Djambarrpuyngu Djamindjung Djangun Djauan Djawi Djeebbana Djinang Djinba Djingili Djiwarli Djongkang Dobel Dobu Doe Doga Doghoro Dogon, Bangeri Me Dogon, Bondum Dom Dogon, Dogul Dom Dogon, Donno So Dogon, Jamsay Dogon, Kolum So Dogon, Tene Kan Dogon, Tomo Kan Dogon, Toro So Dogon, Toro Tegu DogosÈ Dogoso Dogri Dogrib Dohoi Doka Doko-Uyanga Dolgan Dolpo Dom Domaaki Domari Dombe Dominican Sign Language Dompo Domu Domung Dondo Dong Dong, Northern Dong, Southern Dongo Dongotono Dongxiang Doondo Dori'o Doromu Dorze Doso Doutai Doyayo Drents Drung Duala Duano Duau Dubli Dubu Duduela Dugun Duguri Dugwor Duhwa Duke Dulbu Duma Dumbea Dumi Dumpas Dumpu Dumun Duna Dungan Dungmali Dungra Bhil Dungu Duri Duriankere Duruma Duruwa Dusner Dusun Deyah Dusun Malang Dusun Witu Dusun, Central Dusun, Sugut Dusun, Tambunan Dusun, Tempasuk Dutch Dutch Sign Language Duungooma Duupa Duvle Duwai Duwet Dwang Dyaabugay Dyaberdyaber Dyan Dyangadi Dyirbal Dyugun Dza Dzalakha Dzando Dzao Min Dzhidi Dzodinka Dzongkha Dz˜˜ngoo E East Cree, Northern East Cree, Southern Ebira EbriÈ Ebughu Ecuadorian Sign Language Ede Cabe Ede Ica Ede Idaca Ede Ije Ede Nago Ede Nago, Kura Ede Nago, Manigri-KambolÈ Edo Edolo Edopi Efai Efate, North Efate, South Efe Efik Efutop Ega Eggon Egypt Sign Language Ehueun Eipomek Eitiep Ejagham Ejamat Ekajuk Ekari Eki Ekit Ekpeye El Hugeirat El Molo Eleme Elepi Elip Elkei Eloyi Elpaputih Elseng Elu Emae Emai-Iuleha-Ora Eman Embaloh Ember-, Northern Ember--BaudÛ Ember--CatÌo Ember--ChamÌ Ember--TadÛ Embu Emerillon Emiliano-Romagnolo Emplawas Emumu En E'Ôapa Woromaipu EnawenÊ-NawÊ Ende Enets, Forest Enets, Tundra Enga Engenni Enggano English Enim Enrekang Enu Enwan Enwan Enya Epena Epie Eravallan Erave Ere Eritai Erokwanas Erre Ersu Eruwa Erzya Esan Ese Ese Ejja Eshtehardi Esimbi Esperanto Estonian Estonian Sign Language Estonian, North Estonian, South Etebi Eten Ethiopian Sign Language Etkywan Eton Eton Etulo Europanto Evant Even Evenki Ewage-Notu ...wÊ Ewondo Extremaduran Eyak Fa D'ambu Fagani Faita Faiwol Fala Fali Fali of Baissa Fali, North Fali, South Fam Fanagalo Fang Fang Fania Farefare Faroese Fars, Northwestern Fars, Southwestern Farsi, Eastern Farsi, Western Fas Fasu Fataleka Fataluku Fayu Fe'fe' Fembe Fernando Po Creole English Feroge Fijian Fijian, Western Filipino Finallig Finnish Finnish Sign Language Finnish, Kven Finnish, Tornedalen Finnish-Swedish Sign Language Finongan Fipa Firan Fiwaga Flemish Flemish Sign Language Flinders Island Foau Foi Folopa Foma Fon Fongoro Foodo Forak Fordata Fore Fortsenal Franco-ProvenÂal French French Sign Language French, Cajun Frisian, Eastern Frisian, Northern Frisian, Western Friulian Fulfulde, Adamawa Fulfulde, Bagirmi Fulfulde, Borgu Fulfulde, Central-Eastern Niger Fulfulde, Maasina Fulfulde, Nigerian Fulfulde, Western Niger Fuliiru Fum Fungwa Fur Furu Futuna, EastFutuna-Aniwa Fuyug Fw,i Fwe Fyam Fyer Ga Gaa Gaam Ga'anda Gabri Gabutamon Gadaba, Bodo Gadaba, Mudhili Gadaba, Pottangi Ollar Gadang Ga'dang Gaddang Gaddi Gade Gadjerawang Gadsup Gaelic, Irish Gaelic, Scottish Gagadu Gagauz Gagu Gahri Gaikundi Gail Gaina Gal Galambu Galela Galeya Galician Galoli Gambera Gamilaraay Gamit Gamkonora Gamo-Gofa-Dawro Gana Ganda Gane Ganggalida Ganglau Gangte Gants Ganza Ganzi Gao Gapapaiwa Garasia, Adiwasi Garasia, Rajput Garawa Garhwali Garifuna Garig-Ilgar Garo Garre Garreh-Ajuran Garus Gascon Gata' Gavar Gavi„o do Jiparan· Gavi„o, Par· Gawar-Bati Gawwada Gayo Gazi Gbagyi Gbanu Gbanziri Gbari Gbati-ri Gbaya Gbaya, Northwest Gbaya, Southwest Gbaya-Bossangoa Gbaya-Bozoum Gbayi Gbe, Ayizo Gbe, Ci Gbe, Defi Gbe, Eastern Xwla Gbe, Gbesi Gbe, Kotafon Gbe, Maxi Gbe, Saxwe Gbe, Tofin Gbe, Waci Gbe, Weme Gbe, Western Xwla Gbe, Xwela Gbii Gbiri-Niragu Gebe Gedaged Gedeo Geji Gela Gelao Gelao, Green Gelao, Red Gelao, White Geman Deng Geme Gen Gende Gengle Georgian Gera German Sign Language German, Colonia Tovar German, Hutterite German, Pennsylvania German, Standard German, Swiss Geruma Geser-Gorom GhadamËs Ghale, Kutang Ghale, Northern Ghale, Southern Ghanaian Sign Language Ghanongga Ghari Ghayavi Ghera hodoberi Ghom·l·' Ghotuo Ghulfan Giangan Gibanawa Gidar Giiwo Gikuyu Gikyode Gilaki Gilima Gilyak Gimi Gimi Gimme Gimnime Ginuman Ginyanga Girawa Giryama Gitua Gitxsan Giyug Giziga, North Giziga, South Gizrra Glaro-Twabo Glavda Glio-Oubi Gnau Goaria Gobasi Gobu GodiÈ Godwari Goemai Gogo Gogodala Gokana Gola Golin Gondi, Northern Gondi, Southern Gone Dau Gongduk Gonja Gooniyandi Gor Gorakor Gorap Gorontalo Gorovu Gorowa Goundo GourmanchÈma Gowlan Gowli Gowro Gozarkhani Grangali Grebo, Barclayville Grebo, Central Grebo, Gboloo Grebo, Northern Grebo, Southern Greek Greek Sign Language Grenadian Creole English Gresi Groma Gronings Gros Ventre Gua Guadeloupean Creole French Guahibo Guaj· Guajaj·ra Guambiano Guana Guanano Guanyinqiao Guaranì, Ava Guaranì, Eastern Bolivian Guaranì, Mby· Guaranì, Paraguayan Guaranì, Western Bolivian Guarayu Guarequena Guatemalan Sign Language GuatÛ Guayabero Gudanji Gude Gudu Guduf-Gava Gugadj Gugu Badhun Gugubera Guguyimidjir Guhu-Samane Guianese Creole French Guinean Sign Language Guiqiong Gujarati Gujari Gula Gula Gula Iro Gula'alaa Gulay Gumalu Gumatj Gumawana Gumuz Gun Gundi Gungabula Gungu Guntai Gunwinggu Gunya Gupa-Abawa Gupapuyngu Guragone Guramalum Gurani Gurdjar Gurgula Guriaso Gurinji Gurmana Guro Gurung, Eastern Gurung, Western Guruntum-Mbaaru Gusan Gusii Gusilay Guwamu Guya Guyanese Creole English Gvoko Gwa Gwahatike Gwamhi-Wuri Gwandara Gweda Gweno Gwere Gwich'in Gyele Gyem Ha Habu Hadiyya Hadza Haeke Hahon Hai//om Haida, Northern Haida, Southern Haigwai Haiphong Sign Language Haisla Haitian Creole French Haitian Vodoun Culture Language Hajong Hak^ Halang Halang Doan Halbi Halia Halkomelem Hamap Hamba Hamer-Banna Hamtai Han Hanga Hanga Hundi Hangaza Hani Hano Hanoi Sign Language Hanunoo Harari Harauti Haroi Harsusi Haruai Haruku Haryanvi Harzani Hasha Hassaniyya Hatam Hausa Hausa Sign Language Havasupai-Walapai-YavapaiHaveke Havu Hawai'i Creole English Hawai'i Pidgin Sign Language Hawaiian Haya Hazaragi Hdi Hebrew Hehe Heiban Heiltsuk Helambu Sherpa Helong Hema Hemba HerdÈ Herero HÊrtevin Hewa Heyo Hidatsa Higaonon Hijuk Hiligaynon Himarim„ Hindi Hindko, Northern Hindko, Southern Hinduri Hindustani, Caribbean Hindustani, Fijian Hinukh Hitu Hiw Hixkary·na Hlai Hmar Hmong Daw Hmong DÙ Hmong Don Hmong Njua Hmong Shua Hmong, Central Huishui Hmong, Central Mashan Hmong, Chonganjiang Hmong, Eastern Huishui Hmong, Eastern Qiandong Hmong, Eastern Xiangxi Hmong, Luopohe Hmong, Northeastern Dian Hmong, Northern Guiyang Hmong, Northern Huishui Hmong, Northern Mashan Hmong, Northern Qiandong Hmong, Southern Guiyang Hmong, Southern Mashan Hmong, Southern Qiandong Hmong, Southwestern Guiyang Hmong, Southwestern Huishui Hmong, Western Mashan Hmong, Western Xiangxi Hmwaveke Ho Ho Chi Minh City Sign Language Hoava HobyÛt Ho-Chunk Holikachuk Holiya Holoholo Holu Honduras Sign Language Hıne Honi Hopi Horom Horpa Horuru Hote Hoti Hovongan Hozo Hpon Hrangkhol Hre Hruso Hu Huachipaeri Huambisa Huarijio Huastec, San Luîs PotosÌ Huastec, Southeastern Huastec, Veracruz Huaulu Huave, San Dionisio del Mar Huave, San Francisco del Mar Huave, San Mateo del Mar Huave, Santa Marìa del Mar Huba Huichol Huilliche Huitoto, Minica Huitoto, Murui Huitoto, N,pode Hukumina Hula Hulaul· Huli Hulung Humene Humla Hunde Hung Hungana Hungarian Hungarian Sign Language Hungworo Hun-Saare Hunsriker Hunzib Hupa HupdÌ Hupla Hwana Hya Hyam Iaai Iamalele Iapama IatÍ Iatmul Iau Ibaloi Iban Ibanag Ibani Ibatan Ibibio Ibilo Ibino Ibu Ibuoro Icelandic Icelandic Sign Language Iceve-Maci Ida'an Idakho-Isukha-Tiriki IdatÈ Idere Idesa Idi Idoma Idon Idu-Mishmi Idun Iduna IfÈ Ifugao, Amganad Ifugao, Batad Ifugao, Mayoyao Ifugao, Tuwali Igala Igana Igbo Igede Ignaciano Igo Iguta Igwe Iha Iha Based Pidgin Ihievbe Ija-Zuba Ijo, Southeast Ik Ika Ikizu Iko Ikobi-Mena Ikoma-Nata-Isenye Ikpeng Ikpeshi Ikposo Iku-Gora-Ankwa Ikulu Ikwere Ila Ile Ape Ili Turki Ili'uun Ilocano Ilongot Ilue Ilwana Imbongu Imeraguen Imonda Imroing Inabaknon Inakeanon Inapang IÔapari Indian Sign Language Indonesian Indonesian Sign Language Indonesian, Peranakan Indri Inga Inga, Jungle Ingrian Ingush Inoke-Yate Inonhan Inor Interlingua Intha

!O!ung !XÛı //Ani //Gana /Gwi áHua áKx'au//'ein Aari Aariya Aas·x Abadi Abaga Abai Sungai Abanyom Abar Abau Abaza AbÊ Abidji Abinomn Abkhaz Abnaki, Western Abom Abon Abron Abu Abua Abui Abun Abung Abure Abureni Aceh Achagua Achang AchÊ Acheron Achi', Cubulco Achi', Rabinal Acholi Achterhoeks Achuar-Shiwiar Achumawi Acipa, Eastern Adabe Adamorobe Sign Language Adang Adangbe Adap Adele Adhola Adi Adi, Galo Adioukrou Adnyamathanha Adonara Aduge Adyghe Adzera Aekyom Aer Afade Afar Afitti Afrikaans Afro-Seminole Creole Agarabi Agariya Agatu Aghem AghuAghul Agi Agob Agoi Agta, Alabat Island Agta, Camarines Norte Agta, Casiguran Dumagat Agta, Central Cagayan Agta, Dupaninan Agta, Isarog Agta, Mt. Iraya Agta, Mt. Iriga Agta, Remontado Agta, Umiray Dumaget Aguaruna Aguna Agutaynen Agwagwune ¿h‡n Ahanta Ahe Aheu Ahirani Ahtena Ai-Cham Aighon Aikan„ Aiklep Aiku Aimele Aimol Ainbai Ainu Ainu Aiome Airoran Aiton Aizi, Aproumu Aizi, Mobumrin Aizi, Tiagbamrin Aja Aja AjiÎ Ajyìninka Apurucayali Ak Aka Akan Akaselem Akateko Akawaio Ake Akebu Akei Akha Akhvakh Akolet Akoose Akoye Akpa Akpes Akrukay Akuku Akum Akurio Akwa Alaba Alabama Alago Alagwa Alak Alamblak Alangan Alawa Albanian, ArbÎreshÌ Albanian, Arvanitika Albanian, Gheg Albanian, Tosk Alege Alekano Aleut Aleut, Mednyj Algerian Sign Language Algonquin Ali Alladian Allar Alngith Alor Alta, Northern Alta, Southern Altai, Northern Altai, Southern Alumu-Tesu Alune Alur Alutor Alviri-Vidari Alyawarr Ama Ama Amahai Amahuaca Amaimon Amal Amami-Oshima, Northern Amami-Oshima, Southern Amanab Amap· Creole Amara Amarag Amarakaeri Amarasi Amba Amba Ambae, East Ambae, West Ambai Ambakich Ambelau Ambele Amblong Ambo Ambrak Ambrym, North Ambrym, Southeast Ambulas Amdang Amele Amerax American Sign Language Amharic Ami AmikoanaAmis Amis, Nataoran Amo Amol Ampanang Amri Karbi Amto Amundava Amuzgo, Guerrero Amuzgo, Ipalapa Amuzgo, San Pedro Amuzgos Anaang Anakalangu Anal Anam AnambÊ Anamgura Anasi ¡nc· Andaman Creole Hindi Andarum Andegerebinha Andh Andi Andio Andoque Andra-Hus Aneityum Anem Aneme Wake Anfillo Angaatiha Angal Angal Enen Angal Heneng Angika Angloromani Angolar Angor Angoram Anii Animere Anindilyakwa Anjam Ankave Anmatyerre Anor Ansus Antakarinya Antigua and Barbuda Creole English Anu Anuak Anufo Anuki Anus Anuta Anyin Anyin Morofo Aoheng Aore Ap Ma Apache, Jicarilla Apache, Kiowa Apache, Lipan Apache, Mescalero-Chiricahua Apache, estern Apalaì Apali Apalik Apatani Apiak· ApinayÈ Apma A-Pucikwar Apurin„ Aputai Arabana Arabela Arabic, Algerian Saharan Spoken Arabic, Algerian Spoken Arabic, Babalia Creole Arabic, Baharna Spoken Arabic, Chadian Spoken Arabic, Cypriot Spoken Arabic, Dhofari Spoken Arabic, Eastern Egyptian Bedawi Spoken Arabic, Egyptian Spoken Arabic, Gulf Spoken Arabic, Hadrami Spoken Arabic, Hijazi Spoken Arabic, Judeo-Iraqi Arabic, Judeo-Moroccan Arabic, Judeo-Tripolitanian Arabic, Judeo-Tunisian Arabic, Judeo-Yemeni Arabic, Libyan Spoken Arabic, Mesopotamian Spoken Arabic, Moroccan Spoken Arabic, Najdi Spoken Arabic, North Levantine Spoken Arabic, North Mesopotamian Spoken Arabic, Omani Spoken Arabic, Sa‹idi Spoken Arabic, Sanaani Spoken Arabic, Shihhi Spoken Arabic, South Levantine Spoken Arabic, Standard Arabic, Sudanese Creole Arabic, Sudanese Spoken Arabic, Ta'izzi-Adeni Spoken Arabic, Tajiki Spoken Arabic, Tunisian Spoken Arabic, Uzbeki Spoken Arafundi Aragonese Arakanese Araki Aralle-Tabulahan Aramanik Arammba Aranadan Arandai Araona Arapaho Arapesh, Bumbita Ar·ra, Par· Arawak ArawetÈ Arawum Arbore Archi Are 'Are'are Areba Arem Argentine Sign Language Argobba Arguni Arh, Arhˆ Arhuaco Ari Aribwaung Arifama-Miniafia Arigidi Arikap' Arikara Aringa Armenian Armenian Sign Language Aromanian Arop-Lukep Arop-Sissano Arosi Arrarnta, Western Arrernte, Eastern Arta Aru· Aruamu Aruek Aruop Arutani As Asaro'o Asas Ash·ninka Ashe AshÊninka Pajonal AshÊninka PerenÊ AshÊninka, Pichis AshÊninka, South Ucayali AshÊninka, Ucayali-Yur'a Ashkun Ashtiani Asilulu Askopan Asmat, Casuarina Coast Asmat, Central Asmat, North Asmat, Yaosakor Asoa Assamese Assangori Assiniboine Assyrian Neo-Aramaic Asturian Asu Asu Asumboa Asuri Asurini of Tocantins Asurini of Xingu Ata Atampaya Atayal Atemble Athpariya Ati Atikamekw Atohwaim Atong A'tong Atorada Atsam Atsugewi Atta, Faire Atta, Pamplona Atta, Pudtol AttiÊ Atuence Au 'Auhelawa Aukan Aulua Aur· Aushi Austral Australian Aborigines Sign Language Australian Sign Language Austrian Sign Language Auvergnat Auwe Auye Av·-Canoeiro Avar Avatime Avau Avikam Avokaya Awa Awa-Cuaiquer Awad Bing Awadhi Awak Awakateko Awar Awara Awbono Aweer Awera AwetÌ Awing Awiyaana Awjilah Awngi Awtuw Awun Awutu Awyi Awyu, Asue Awyu, Central Awyu, Edera Awyu, Jair Awyu, North Awyu, South Axamb Ayabadhu Ayere Ayi Ayi Ayiwo Aymara, Central Aymara, Southern Ayoreo Ayta, Abellen Ayta, Ambala Ayta, Bataan Ayta, Mag-Anchi Ayta, Mag-Indi Ayta, Sorsogon Ayu Azerbaijani, North Azerbaijani, South Baan Baangi Baatonum Baba Babango Babanki Babar, North Babar, Southeast Babatana Babine Babuza Bacama Bada Bada Badaga Bade Badeshi Badimaya Badui Badyara Baeggu Baelelea Baetora Bafanji Bafaw-Balong Bafia Bafut Baga Binari Baga Koga Baga Manduri Baga Mboteni Baga Sitemu Bagheli Bagirmi Bago-Kusuntu Bagri Bagupi Bagusa Bagvalal Baham Bahamas Creole English Bahau Bahinemo Bahing Bahnar Bahonsuai Bai Bai, Central Bai, Northern Bai, Southern Baibai Baikeno Baima Baimak Bainouk-Gunyaamolo Bainouk-GunyuÔo Bainouk-Samik Baiso Bajan Bajau, Indonesian Bajau, West Coast Bajelani Baka Baka BakairÌ Bakaka Bakhti,ri Baki Bakoko Bakole Bakpinka Bakumpai BakwÈ Balaesang Balangao Balangingi Balanta-Ganja Balantak Balanta-Kentohe Balau Baldemu Bali Bali Bali Sign Language Balinese Balkan Gagauz Turkish Balo Balochi, Eastern Balochi, Southern Balochi, Western Baloi Balti Baluan-Pam Bamako Sign Language Bamali Bamanankan Bambalang Bambam Bambassi Bambili-Bambui Bamenyam Bamu Bamukumbit Bamun Bamunka Bamwe Ban Khor Sign Language Bana Banaro Banaw· Banda Banda, Mid-Southern Banda, South Central Banda, Togbo-Vara Banda, West Central Banda-Bambari Banda-Banda Banda-MbrËs Banda-NdÈìÈ Banda-Yangere Bandi Bandial Bandjalang Bandjigali Bangala Bangandu Bangba Banggai Bangi Bangolan Bangubangu Bangwinji Baniwa Banjar Bankagooma Bankon Bannoni Bantawa Bantik Bantoanon BaoulÈ Baraamu Barai Barakai Barama Barambu Baramu Barapasi Baras Barasana-Eduria Bardi Barein Bareli, Palya Bareli, PauriBargam Bari Barì Bariai Bariji Barikanchi Barok Barombi Barrow Point Baruga Baruya Barwe Barzani Jewish Neo-Aramaic Basa Basaa Basa-Gurmana Basap Bashkardi Bashkir Basketo Basque Basque, Navarro-Labourdin Basque, Souletin Bassa Bassa-Kontagora Bassari Bassossi Bata Batak Batak Alas-Kluet Batak Angkola Batak Dairi Batak Karo Batak Mandailing Batak Simalungun Batak Toba Batanga Batek Bateri Bathari Bati Bati Bats Batu Batuley Bau Bauchi Baure Bauria Bauro Bauwaki Bauzi Bavarian Bayono Bayot Bayungu Bazigar Beami Beaver Beba Bebe Bebele Bebeli Bebil Bedawiyet Bedjond Bedoanas Beeke Beele Beembe Beezen Befang Begbere-Ejar Behoa Bekati' Bekwarra Bekwil Belait Belanda Bor Belanda Viri Belarusan Belgian Sign Language Belhariya Beli Beli Belize Kriol English Bella Coola Bellari Bemba Bemba Bembe Bena Bena Benabena Bench Bende Bendi Beng Benga Bengali Benggoi Bengkulu Bentong Benyadu' Bepour Bera Berakou Berawan Berbice Creole Dutch Berik Berinomo Berom Berta Besisi Besme Betaf Betawi Bete BÈtÊ, Daloa BÈtÊ, Gagnoa BÊte, Guiberoua Bete-Bendi Beti Beti Bezhta Bhadrawahi Bhalay Bharia Bhatola Bhatri Bhattiyali Bhaya Bhele Bhilali Bhili Bhojpuri Bhujel Bhunjia Biafada Biak Biali Biangai Biao Biao Mon Biao-Jiao Mien Biatah Bicolano, Albay Bicolano, Central Bicolano, Iriga Bicolano, Northern Catanduanes Bicolano, Southern Catanduanes Bidiyo Bidyara Bidyogo Biem Bierebo Bieria Biete Biga Bijori Bikaru Bikya Bila Bilakura Bilaspuri Bilba Bilbil Bile Bilen Bilua Bilur Bima Bimin Bimoba Bina Binahari Binandere Bine Binji Bintauna Bintulu Binukid Binumarien Bipi Birale Birao Birgit Birhor Birifor, Malba Birifor, Southern Biritai Birri Birwa Bisaya, Brunei Bisaya, Sabah Bisaya, Sarawak Biseni Bishnupriya ishuo Bisis Bislama Bisorio Bissa Bisu Bit Bitare Bitur Biwat Biyo Biyom Blaan, Koronadal Blaan, Sarangani Blablanga Blackfoot Blafe Blagar Blang Bo Bo Boano Boano Bobo MadarÈ, Northern Bobongko Bobot Bodo Bodo Parja Bofi Boga Bogan Bogaya Boghom Boguru Bohtan Neo-Aramaic Boikin Boko Boko Bokobaru Bokoto Bokyi Bola Bolango Bole Bolgo Bolia Bolinao Bolivian Sign Language Bolo Boloki Bolon Bolondo Bolongan Bolyu Bom Boma Bomboli Bomboma Bomitaba Bomu Bomwali Bon Gula Bonan Bondei Bondo Bonerate Bonerif Bonggi Bonggo Bongili Bongo Bongu Bonjo Bonkeng Bonkiman Bontoc, Central Bookan Boon Boor Bora Borna Boro Borong BorÙro Boruca Bo-Rukul Boselewa Bosmun Bosnian Bote-Majhi Botlikh Bouyei Bozaba Bozo, Hainyaxo Bozo, Jenaama Bozo, TiemacÊwÊ Bozo, TiÊyaxo Bragat Brahui Braj Bhasha Brazilian Sign Language Brem Breri Breton Bribri British Sign Language Brokkat Brokpake Brokskat Broome Pearling Lugger Pidgin Bru, Eastern Bru, Western Brunei Bu Bua Buamu Buang, Mangga Buang, Mapos Bube Bubi Bubia Budibud Budik Budong-Budong Budu Budukh Buduma Budza Bugan Bugawac Bughotu Bugis Buglere Bugun Buhid Buhutu Bukar Sadong Bukat Bukharic Bukitan Bukiyip Buksa Bukusu Bukwen Bulgarian Bulgarian Sign Language Bulgebi Buli Buli Bullom So Bulu Bulu Bum Bumaji Bumthangkha Bun Buna Bunaba Bunak Bunama Bundeli Bung Bungain Bungku Bungu Bunu, Bu-Nao Bunu, Jiongnai Bunu, Wunai Bunu, Younuo Bunun Buol Burak Buraka Bura-Pabir Burarra Burate Burduna Bure Buriat, China Buriat, Mongolia Buriat, Russia Burji Burmbar Burmese Burmeso Buru Buru Burui Burumakok Burum-Mindik Burun Burunge Burushaski Burusu Buruwai Busa Busam Busami Bushi Bushoong Buso Busoa Bussa Busuu Butmas-Tur Butuanon Buwal Buxinhua Buya Buyang Buyu Bwa Bwaidoka Bwamu, Cwi Bwamu, L·· L·· Bwanabwana Bwatoo Bwela Bwile Bwisi Byangsi Byep Caac CabÊcar Cabiyarì Cacua Caddo Cafundo Creole Cahuarano Cahuilla Caka Cakfem-Mushere Callawalla CalÛ Caluyanun Camling Campalagian Cams· Camtho Candoshi-Shapra Canela Cao Lan Cao Miao Capanahua Capiznon Caquinte Cara Carabayo Carapana Carib Carijona Carolinian Carrier Carrier, Southern Cashibo-Cacataibo Catalan-Valencian-Balear Catalonian Sign Language CavineÔa Cayuga Cebuano CemuhÔ Cent¨m Cerma Chachi Ch·cobo Chadian Sign Language Chaima Chak Chakali Chakma Chala Chaldean Neo-Aramaic Chalikha Cham, Eastern Cham, Western Chamacoco Chamalal Chamari Chambeali Chambri Chamicuro Chamorro Changriwa Changthang Chantyal Chara Chatino, Eastern Highland Chatino, Nopala Chatino, Tataltepec Chatino, Western Highland Chatino, Zacatepec Chatino, Zenzontepec Chaudangsi Chaungtha Chaura Chavacano Chayahuita Che Chechen Cheke Holo Chenapian Chenchu Chenoua Chepang Cherepon Cherokee Chetco Chewong Cheyenne Chhattisgarhi Chhintange Chhulung Chiangmai Sign Language Chiapanec Chichimeca-Jonaz Chickasaw Chiga Chilcotin Chilean Sign Language Chilisso Chimila Chin, Asho Chin, Bawm Chin, Bualkhaw Chin, Chinbon Chin, Daai Chin, Eolam Chin, Falam Chin, Haka Chin, Khumi Chin, Khumi Awa Chin, Mara Chin, Mro Chin, Ma Chin, Ngawn Chin, Paite Chin, Senthang Chin, Sivin Chin, Tawr Chin, Tedim Chin, Thado Chin, Zotung Chinali

a language for the visual era



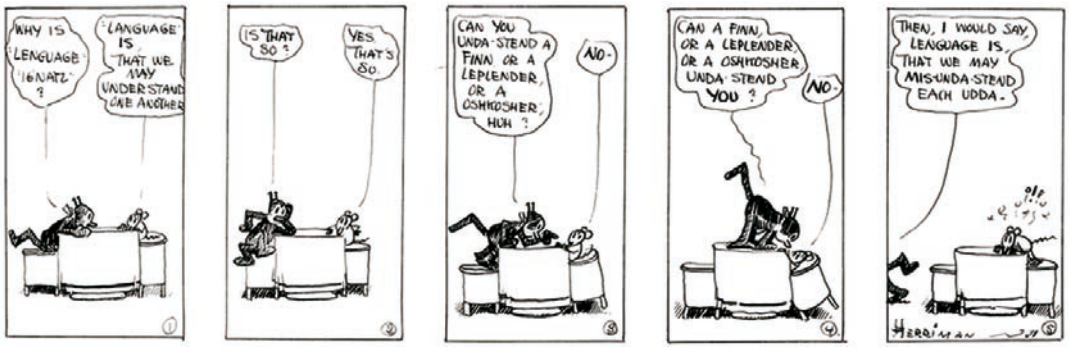
Pictogram detailing various
ethnicities of the world,
Gerd Arntz, 1920's

A language for the visual era

The world speaks in about 7000 tongues, and countless dialects. Although this great variation of languages is a rich source for cultural diversity, it is also the cause of much misunderstanding and exclusion. As the old Bible story recounts: when united, man can strive to become as powerful as God, and so He divided them by making them speak different languages. Similar mythologies to explain the great diversity of languages exist in other cultures.
In 1918, just before the first experiments with developing a visual language that are the starting point of this book, the famous American cartoonist George

Herriman poked fun at the global misunderstanding caused by so many different languages. In one of the best episodes of his comic strip ‘Krazy Kat’, the cat and Ignatz, his mouse friend, have a Socratic dialogue about the reason for language. Kat comes to an inescapable conclusion: “Then, I would say, lenguage is, that we may mis-unda-stend each udda.” This strip from January 6th, 1918, is arguably the most concise – and humorous – summary of the dire results of the mythical Tower of Babel.

For centuries, people have tried to overcome this barrier, for instance by propagating one language, like Latin



Krazy Kat, George Herriman, 1918

in the Roman empire, or by inventing a new language, such as Esperanto at the end of the 19th century, or by a shared second language, like English in our time.

Today however, the language which is best understood world-wide probably consists, not of words, but of images. We live in an increasingly 'visual' world, in which 'visual' does not simply mean 'things we can see', but 'things we recognize as having a specific meaning'. In other words, the 'visual' has developed into a language of images – pictorial words –, which can be read just like verbal words in sentences. Moreover, this visual language is

relatively free of the problems posed by traditional language borders, and functions as a basic language that can be used and understood by anyone anywhere in the world. Of course, language is never neutral, and this one is no exception – the current 'universal visual language' reflects a modern urban culture which has spread the world over.

Written language, it must be remembered, started out as more or less pictorial scripts. At the root of ancient Egyptian hieroglyphs and Chinese characters, for instance, are abstracted pictures of recognizable things. Scripts, therefore, may have started as simply indicating objects: a cow's head for

‘cattle’, an upright rectangle for ‘door’. Over time, these denotative symbols acquired meanings detached from their original source until they became symbols for sounds or concepts – in Chinese, characters are words or word forms. Our letter ‘A’, for instance, traces back to the first letter of the Phoenician alphabet, which once was the abstracted symbol of a cow’s head – turn the ‘A’ upside down, and you can still see this pictorial root.

So when we speak of a visual language in our time, built of pictograms and abstracted symbols, we should realize it is not the first. But this one has been designed as a pictorial

language for specific purposes from the start. In earlier centuries there have been iconographic programs that worked more or less like a coherent visual narrative, such as the pictorial translations of biblical stories and doctrines which adorn Catholic churches and chapels. This 'bible for the illiterate' as these picture stories were called did not just illustrate the lives of saints and sinners, but also visualised the argumentative structure behind the stories: the way these religious images were organised and arranged reflected the inner logic of the articles of faith that guided their content. 'Christ on the cross' and 'The Virgin and Child' are iconograms that mean much more than

what they visually depict. In that sense they are akin to modern pictograms, which summarize or symbolize meanings way beyond their actual appearance.

Such images, however, need to be interpreted on the basis of a thorough knowledge of their conceptual content. To non-believers who have not been brought up in a Christian culture, a picture of a bearded man with a stick carrying a baby across a river means just that: an old man taking a kid to the other side. Symbolically, of course, the image of St. Christopher stands for ‘carrying the gospel with you through the river of life – and live according to its principles’. Essentially, this relation



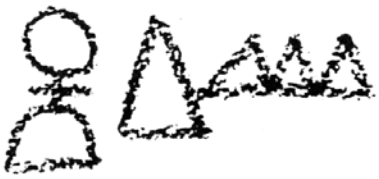
Saint Christopher carrying Christ, Konrad Witz, c.1435

between the image and the meaning it summarizes is not so different from that of the white arrow on a blue shield that means ‘this way’. At the same time, the latter sign, the arrow, is fundamentally different from the depiction of the saint: the traffic sign does not refer to a story or argument – it is, in other words, not allegorical or rhetorical – it is simply the visual translation of a rule. This ‘literalness’, or explicitness, characterizes it as a building block for a language.

Another age-old sign system, and one that also works with abstracted symbols rather than pictorial allegories, is the signage system developed by gypsies



kind lady lives here



kind woman, tell pitiful story



fresh water, safe campsite



if you are sick, they'll care for you



doctor here, won't charge



free telephone



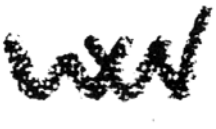
alcohol in this town



keep quiet



hold your tongue



barking dog here



vicious dog here



the sky is the limit



trolley stop



dangerous drinking water



this is not a safe place

Gypsy signs, redrawn by Henry Dreyfuss, from his Symbol Sourcebook, 1972

around the world. They may speak many different languages, but they can all read the signs which are left for them by their kinfolk who visited a place before them. Chalked signs which warn for aggressive townspeople and dangerous drinking water, or point to hospitable persons or safe camping sites are found along their travel routes.[1] These are, however, not signs that can be universally understood. Like religious symbols, they form part of a subculture and have to be learned to be interpreted in the right way.

So the question remains: how to design visual signs which are understood by everyone, regardless of their language

[1] See Henry Dreyfuss, Symbol Sourcebook, New York 1972, p.90

or culture or whether they can read or not? This question has been tackled by many designers and scholars, amongst whom a few stand out. Otto Neurath, a Viennese philosopher and economist, devised a 'picture language' in the 1920s to solve the problem. Based on the visual grammar and syntax developed by Neurath, graphic artist Gerd Arntz drew around 4000 symbols and pictograms which together constitute the visual thesaurus of ISOTYPE, the International System Of TYpographic Picture Education. These symbols are among the first modern pictograms, signs that summarize a category of things in the context of an action or situation. In 1972, another seminal scholar in this area,

Henry Dreyfuss, published a sourcebook with a vast collection of existing signs and his own designs, to give an overview of generally agreed or shared symbols and their contexts. We have become so familiar with the work of these researchers, pioneers and designers, that we hardly realise the complex cultural, psychological and perceptual mechanisms at work behind the pictograms that today adorn our visual environment and make it readable.

Modern traffic signs like the arrow mentioned earlier are among the first symbols that were designed with the specific aim of unambiguous cross-cultural understanding. With the growing



A universally recognizable sign,
with text in local language.
Even if you can't read Chinese,
you know it says 'stop'.

automobile and train traffic at the start of the 20th century – and with growing speeds – the need for such signs became apparent. Symbols were developed to organise right of way, warn for dangerous crossings ahead or prohibit certain forms of transport in certain directions. Since the 1920s these signs were becoming standardised across the world, also because motorized traffic made travelling across borders easier. Ultimately, this resulted in the 1968 Vienna Convention of Road Signs and Signals, which made the eight-sided stop sign into one of the most universally recognised signs ever devised.

Today, pictograms, logos and icons on traffic signs, way finding, packaging and printed information are everywhere. And they are designed to be understood by anyone, regardless of the readers' language. The whole world can communicate in this pictographic language. But with this dissemination, this lovely language for all spawns more and more dialects.

Take the sign that we in the west consider universal, the pictogram for man. This simple outline of a (male) human being turns out to be not so universal when imported in India. There, the Sikh community interprets the figure not as a neutral sign for

‘man’, but as the depiction of a naked man. Male Sikhs wear a turban and a loin cloth – that is as naked as they get outside the strict confines of their private bathrooms. So the detailing of the pictogram changes, in order to make it ‘neutral’ once again in the new cultural context (see p.220).
Small changes that suggest a different cultural background also appear in pictograms on packages, the signs that literally travel around the globe: the umbrella pictogram that warns to protect the box against the rain can change to that of an Asian parasol without loosing its meaning. It just shows where it originated.
Such variations are akin to variations

in pronunciation of the same words in different dialects; we still understand their meaning, but hear that the one who's speaking is from another region.

When we have thus learned to distinguish between a pictogram's basic form and meaning, and its formal detailing and variations, we can imagine that we not only can 'write' simple rules in this visual language, but can use it for more sophisticated purposes. For centuries, it has been a characteristic of the arts – both verbal and visual – to quote and paraphrase earlier works and by doing so vary on the meanings attached to the older work. Obviously, this only makes sense when readers

and viewers observe the reference. Therefore, such quotation is culturally biased – only those familiar with a culture's history, symbols and 'great works of art' will see the connection and attach meaning to it. For a Muslim, a crescent moon in any image means something quite different from what a non-believer would see in the same picture.

When artists, designers and indeed any creatively inclined user of the new visual media paraphrase pictograms and logos in order to playfully vary on the meanings attached to these signs, it becomes clear that pictographic signs have evolved into a mature visual

language. We can not only read them, we can write with them. Visual language has grown up; everyone understands its basics, but individuals vary on it to compose their own visual poetry.

Max Bruinsma, December 2007



Birth of a visual language

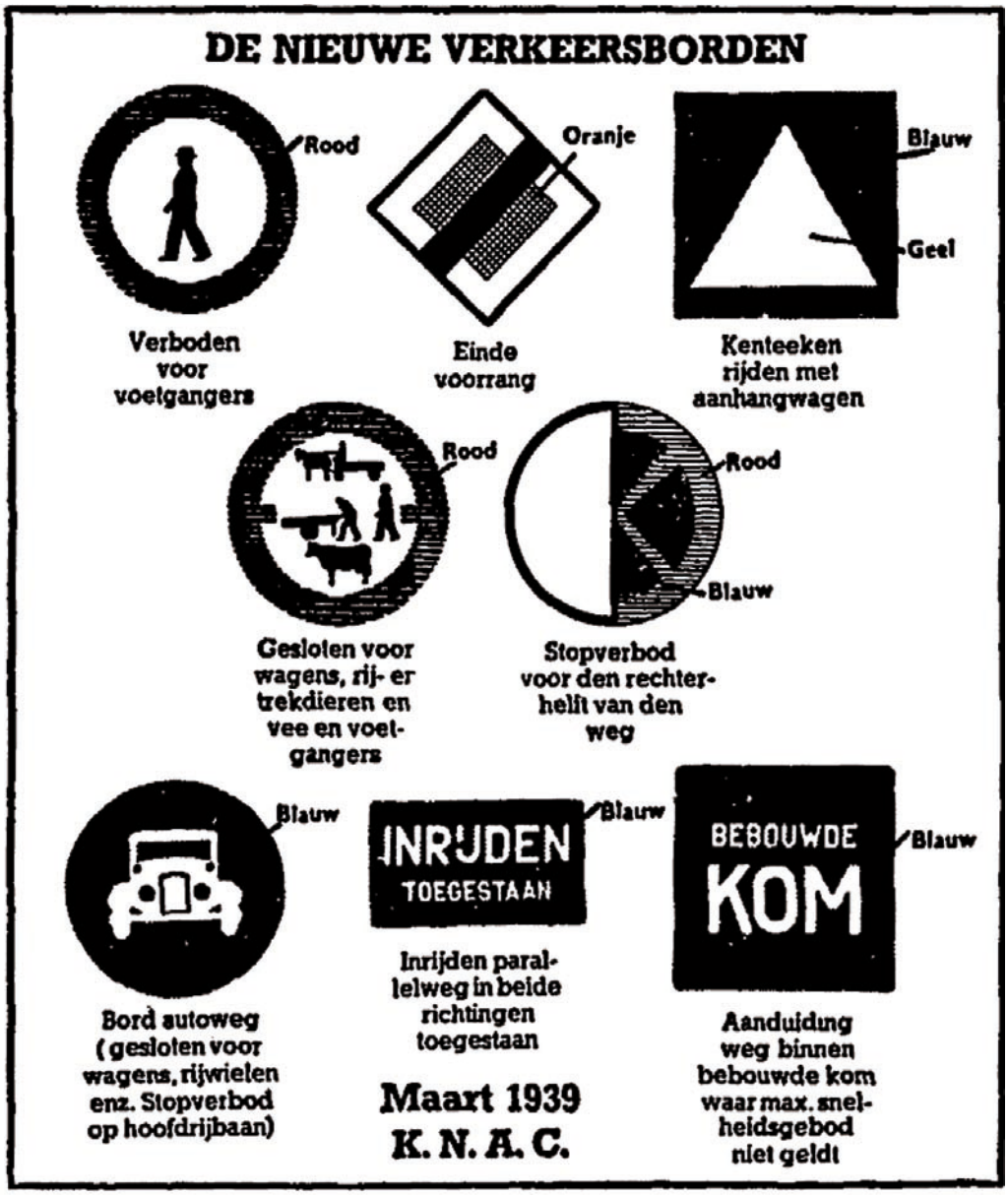
The 1920s and ‘30s saw the beginnings of a new way to communicate in public space, through new signs and signals in advertising and the arts.



View to Dam square, Amsterdam, north side, in the 1920s. Images are scarce, but they are gradually insinuating themselves into the urban fabric. Still, the visual companions of advertising's words are mostly illustrative, or evocative of the advertised product's origin, as in the cigarette poster.



"No automobiles allowed on more than two wheels, not equipped for passenger transport if any goods are transported thereon." and "Vehicles not equipped for passenger transport are prohibited to drive in or through, if any goods are transported thereon." Too many words to be read quickly, and only the Dutch can read them. A sign that begs to be visualized.



'The new traffic signs' *1939*

During the 1930s, the need for visual signs that symbolized the new rules for traffic became apparent. A single sign could summarize sometimes lengthy texts, such as the sign with the abstracted image of a car on a blue field, which replaces this text: "Highway, cars only. Carts, bicycles, etceteras forbidden. No stopping in the main road." This chart of new Dutch traffic signs from 1939 also shows a growing internationalization and standardization of signs; the signs on the left are, with slight stylistic moderations, still used.



Announcement *Kurt Schwitters and Theo van Doesburg* 1923

In the 1920s and '30s, avant-garde movements such as Surrealism, Futurism and Dada celebrated the 'liberation of words'. On the one hand, they became 'freed' of their meaning in nonsense poetry and 'automatic writing', on the other hand they acquired a more visual presence, like in this announcement for a 'Dada matinee' in The Hague, 1923. Letters float like autonomous decorative elements through the composition in which typographic raw material such as lines and boxes is also used to construct an abstracted image of a Dutch windmill.



Wijk bij Duurstede, U. H. E. W. Wijnkamp, „Wijnkamp". Tarief: l. e o. *f* 1.50, d. z. w. *f* 1.20, d. m. w. *f* 1.90; 10 pCt. korting op wijn.
en zweminrichting in „de Lek", geopend van Mei tot einde September van 6 uur voorm. tot zonsondergang.
Wijk bij Heusden, N.-B. (geen postkantoor);
Wijlre, (zie Wilré).
Wildervank, Gr. N. J. Meihuizen.
B. Smit, „de Nederlanden". Tarief: l. e. o. *f* 1.25, d. z. w. *f* 1.25, d. m. w. *f* 1.85; 15 pCt. korting op wijn.
H. H. Baas, Oosterdiep hoek 30e laan.
Wilhelminadorp, Z.
Willemsdorp, Z.-H., (Staatsspoor);

In this 1898 address guide for members of the Dutch Automobile Club ANWB we see early examples of pictograms, which serve to save space and enhance overview. The symbol for 'telegraph' - a pole with isolated wires attached - is probably the most recognizable. The symbols for 'train' and 'bicycle repair' are much too detailed for this small size, while the symbol for 'hotel' could be used for any large building.

Het Volk [The People] *newspaper* 1910

Advertisement page on which only two images are printed. The other ads attempt to attract attention by typographic means. A hybrid of image and typographic sign, the stylized hand with pointing finger acts as directional device and exclamation mark.

DE GESTERILISEERDE
BESSENSAPPEN
v/d Stoom-Vruchtensap-Fabriek der Firma
A. HOOGENDIJK JZN
te VLAARDINGEN,
voldoen aan de strengste eischen der hygiëne, bevatten dus absoluut geen enkel conserveermiddel, blijven onder elke temperatuur onveranderd zoet en geurig van smaak, — zijn tevens ommiddelijk voor export naar de tropen.
N.B. Verkrijgbaar bij de meeste grootere winkelzaken.
Vraagt onze, voor jong en oud zoo gezonde, zuivere **Bramensap.**

Weener Chic. H. FEKETE,
41 Utrechtschestraat 41, Amsterdam.
Meest gesorteerde Dames- en Kinder-Costuums Confectie-Magazijn
is bekend door de geheele stad en omstreken voor de grootste keuze Parijser en Weener Modellen.
Prima coupe, goede afwerking, beste kwaliteiten, tegen de bekende fabrieksprijzen.
COSTUUMS in 8 kleuren, kamgaren, cheviot en diverse fantasie-stoffen effen en gegarneerd op zijde gevoerd f 6.90, 7.75, 8.50, 10.25, 12.50, 15.—, 16.50, 19.—, 24.—, 27.50 tot f 48.—.
DAMES-PALETOTS laken, cheviot in de nieuwste Engelsche fantasie-stoffen van 75 cM. tot 125 cM. lang, los getailleerd met ceintures van f 2.40, 3.20, 4.—, 4.50, 5.25, 6.50, 7.25, f 9.— tot f 39.—
Groote sortteering **KIMONO'S, COSTUUMROKKEN, STOF-, REIN- en REGENMANTELS,** alles tegen fabrieksprijzen.
Dames overtuigt U van de prijzen en de kwaliteiten mijner concurrenten, want U bespaart 25 procent.
Reclame Costuum op zijde gevoerd prima wollen cheviot, f 21.—
Weener Chic. H. FEKETE, Amsterdam.
41 UTRECHTSCHESTRAAT 41.

Nieuw Malthusianisme
Alle, ook de nieuwste **Voorbehoedmiddelen.**
Getil. prijsc. gratis o/couvert.
Arbeiders 25 %.
Speltor & Co., Joubertstr. 72 I, N'dam

A. C. DE RIJK,
Langendijkstraat 23, AMSTERDAM.
BOUWT EIGENHANDIG DE NIEUWSTE CONSTRUCTIE
HEETE LUCHT OVENS.
Attesten ter inzage.

MAX COSMAN,
Fotograaf, Galerij 48.
12 Albums met proef . f 1.50
1 Cabinet . . . . . „ 1.—
Volgende exemplaren „ 0.50
6 Cabinet met proef . „ 3.50
Prima dof (platina).
6 Album met proef . f 2.—
12 „ „ „ „ 3.—
1 Cabinetportret . . „ 1.50
Volgende exemplaren „ 0.75

OPRICHTE HAARLEMMER OLIE FA-BRIEK v/h O. DE KONING & ZOONEN BESTAAT 194 JAAR
HET IS BEWEZEN DAT DE MET GOUD BEKROONDE
G. DE KONING TILLY's HAARLEMMEROLIE
DE ENIGE ECHTE en daarom DE BESTE is.
LET VOORAL OP DE VOORLETTER G.
Het eenige juiste adres is:
Oprechte Haarlemmer Olie Fabriek v/h G. de Koning Tilly, Achterstraat 88 — HAARLEM.
N.V. OPRICHTINGSJAAR No. 194.

Wilt u smullen?
Vraagt dan het merk
DESSERT.
De lekkerste PUDDING der wereld.
Fabrikant H. FRANK, Amsterdam.

VARKENSSLACHTERIJ VAN C. C. J. VAN HANJA,
te JAN STEENSTRAAT 66,
levert steeds f° kwaliteit tegen concurreerende prijzen.

Tandheelk. Kliniek
Albert Cuypstraat 74a, bij de Ferd. Bolstraat.
Spreekuren: 9—12 en Maandag- en Donderdagavond 7—9.
TREKKEN KOSTELOOS.
In slaap (absoluut pijnloos) KUNSTTANDEN PLOMBEEREN billijk.

De Haagsche Rijwielhandel
v/h MERHOTTEIN & Co.,
25 Boekhorststraat 25,
DEN HAAG.
TELEFOON 4053.
Ontvangen een prima buitenband
„The Merhottein Tyre"
met 12 maanden schriftelijke garantie volgens de bepalingen van de Nederl. Vereeniging „de Rijwiel en Automobiel-Industrie."
Prijs f 5.—.
Tevens steeds voorhanden een buitenband
„The Alliance Tyre".
de beste buitenband zonder garantie. Prijs f 2.25.
In de meest courante maten.
Verzending door het geheele land na ontvangst van postwissel of onder rembours met verhooging van 15 cts voor vracht.

PEEK & CLOPPENBURG,
NIEUWENDIJK 164-170.
Expositie der nieuwste modellen voor
Heeren- en Kinder-Costumes.
P. & C. garandeeren **EIGEN FABRIKAAT** van **solide** stoffen, verwerkt met **prima** fourituren.
P. & C. waarborgen **eleganten pasvorm, eerste klas** goederen en **zeer, zeer** laag gestelde prijzen.

GROOTE
Kalveren-Slachterij.
FRICANDEAU . . 40 Cts.
LAPPEN . . . . . 35 en 40 „
GEHAKT . . . . . 25 „
CARBONADE v/d borst 20 „
per pond, 1e kwaliteit.
Quellynstraat 130.
J. BARUCH.

OP
CREDIET
H. BOETHELT
308 H.Z. VOORBURGWAL 308
MEUBELEN
CONFECTIE
BEDDEN

JULIUS ADLER,
DAM, HOEK VISCHSTEEG, AMSTERDAM.
Alle soorten SPUITEN in Glas, Metaal en Elastiek.
Breiben en stil. Prijscourant op aanvraag.

Geliefd
door iedereen is alleen de echte Stokpaardjes-Lelliesmelk-Zeep van Bergmann & Co., Radebeul, want deze geeft een zacht rein gelaat, blozend, jeugdig uiterlijk, blanke fluweelzachte huid en schitterend mooie teint.
A 50 cents per stuk bij:
Het Roode Leeuwtje, Vijzelstraat 28.
T. H. de Zwart, Nassaukade 361.
H. van Dijk, Raadhuisstraat 10.
C. I. Icke, Damrak 35.
Aug. Mook, Utrechtschestr. 8.
Van Velsen frères, Haarl.str. 110.
M. Cleben & Co., Heiligenweg 42.
D. A. Knipper, Rozengracht.
J. H. Teunissen Jr., parf., Vijzelgr. 55.
G. Kok, De Clercqstr. 14 b/d Nassauk.
Van Zalm v. Rijck, Leidschestr. 45.
Gebr. Wouters, Vijzel- en Paleisstr.
A. de Vries Jr., Lootstraat.
G. H. v. d. Benden, 1e J. Steenstr. 54.
G. Valentijn, Rustenburgerstr. 201.
F. Schierink, Eglantiersgracht.
A. C. J. de Lange Zn., K. Prinsgr. 4.
Friseur W. Drouwer, Ferd. Bolstr. 2.

C. F. SARTORI, Camperstraat 48, AMSTERDAM.
bericht de ontvangst van het nieuwste op het gebied van **Dames- en Heeren-Paraplules, Parasols en Wandelstokken**
Vakkundige bediening.

FORNUIZEN.
Geëmailleerde en Gegoten
FORNUIZEN in alle maten
tegen zeer concurreerende prijzen bij
C. H. MEIJER Jr., Jac. v. Lennepstr. 48-50.

„De Centrale" geeft minstens 55 % der zuivere winst aan de arbeidersbeweging.

Zij die over eenigen vrijen tijd hebben te beschikken, kunnen zich als Vertegenwoordiger van **„De Centrale Arbeiders-Verzekerings- en Depositobank" te 's-Gravenhage,** een **goede bijverdienste** verschaffen.
De inspecteurs staan den nieuwen agenten geregeld ter zijde, mede ter opleiding.
Bij gebleken geschiktheid voordeelige voorwaarden.
Aanvragen om een Agentschap gelieve men te richten tot de Directie van het Bijkantoor, Spuistraat 219-221 te Amsterdam of tot de Directie van „De Centrale", Houtmarkt 10, te 's-Gravenhage.

Telegrammen.

's-Gravenhage, 4 April 1910, 's morg. 11 uur 30 minuten:

0. VAN DIJK, GROOTE OOST 46, HOORN.
20 DUIZEND, NUMMER 14718, SERIE A. LOTISICO.

TAKKEN, WITTE VROUWENSINGEL 25/26, UTRECHT.
20 DUIZEND, NUMMER 14718, SERIE B. LOTISICO.

DAGNELIE, DAM 8, AMSTERDAM.
20 DUIZEND, NUMMER 14718, SERIE C. LOTISICO.

DESTRÉE, GROENEWEGJE 7, 's-GRAVENHAGE.
20 DUIZEND, NUMMER 14718, SERIE D EN E, LOTISICO.

JUIJN, WIJNSTRAAT 69, ROTTERDAM.
20 DUIZEND, NUMMER 14718, SERIE F. LOTISICO.

Uit het bovenstaande blijkt, dat geadresseerden, Vertegenwoordigers van *„De Eerste Nederlandsche Maatschappij tot Verzekering van Risico in Loterijen"*, Juliana van Stolbergplein No. 11 te 's-Gravenhage, de Prijsnrs **Nos. 14718 serie A, B, C, D, E en F onder** hunne administratie hebben, waarop eene uitkeering van f 848.65 verschuldigd is, omdat op betreffde nummer in de 2e klasse van de thans trekkende Staatsloterij de prijs van nominaal 20 duizend gevallen is.

Op schriftelijk verzoek aan het adres van **LOTISICO, Julianа van Stolbergplein 11 te 's-Gravenhage,** worden prospectussen met bijbehoorende documenten en eenige proefnummers van het Maandblad der Vennootschap franco per post toegezonden.

Niet de namen der polishouders, doch alléén die der vertegenwoordigers worden gepubliceerd.

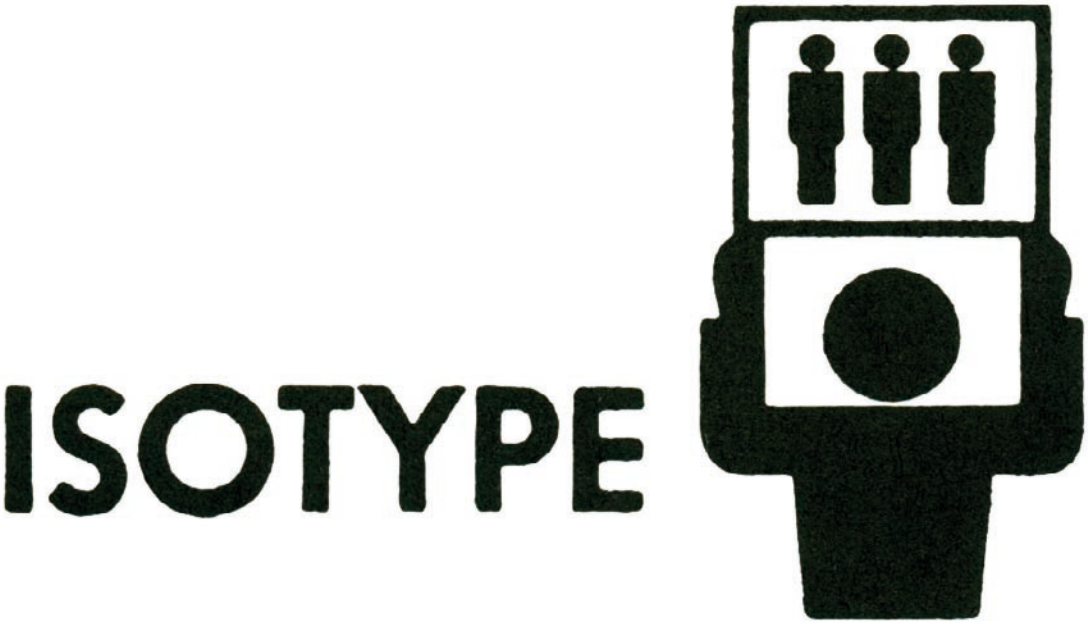

切勿受潮





Isotype

International System Of TYpographic Picture Education – the acronym Otto Neurath devised for his 'Vienna method' of visual statistics is programmatic: educate the masses by means of a systematic use of 'writing in images'.



Isotype logo

Isotype

The first decades of the last century were an era of radical innovation: the telephone was becoming a household item; aided by new technologies, the press reached hitherto unimaginable masses; trains and automobiles fostered mobility on a scale never seen before; and social movements stimulated better living conditions and a growing political awareness of the previously voiceless workers. Those who wanted to keep in touch with this accelerating society needed information, which was distributed by newspapers, magazines, brochures and posters.

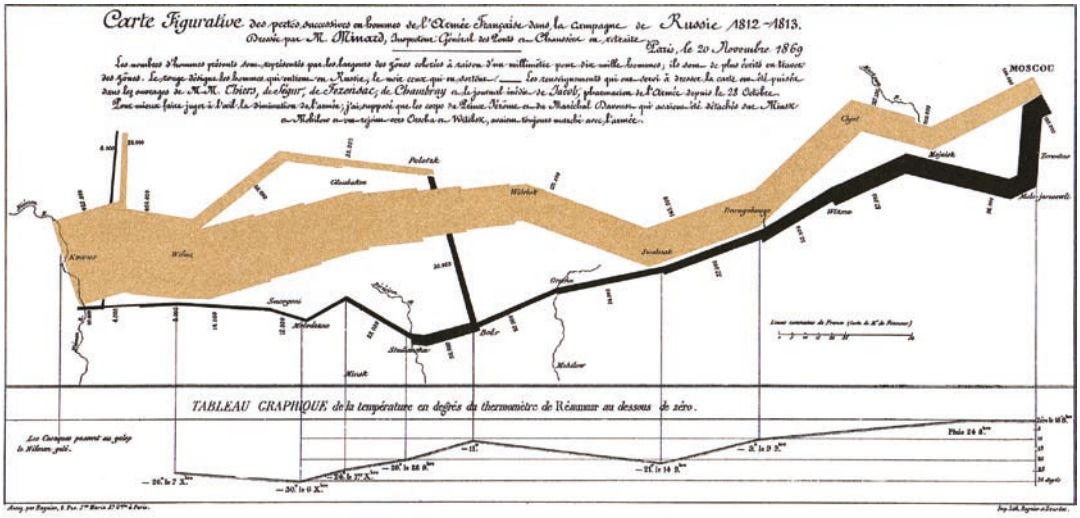
Another radical change was the demise of the old political structures, after the great carnage of the First World War in Europe. Once great empires like Germany and Austria fell apart and became republics, and socialist political parties obtained an unprecedented following, especially in the large cities of the time, such as the Austrian capital, Vienna. There, a social-democrat city government radically changed living conditions for the workers by embarking on a massive housing programme that changed the face of the city, which was known in the 1920's as 'Red Vienna'. Apart from bettering material conditions such as housing and hygiene, the socialists were also keenly interested in educating the masses. 'Objective' information – i.e. information that was not biased by the interests of the former ruling classes – was a key factor in providing the common man with the tools to analyse and criticise the practices of capitalism and argue their own case.

Against this background, the Viennese 'Gesellschafts- und Wirtschaftsmuseum' was founded by the city to provide reliable and integrated information on the world's affairs, and of course to show the successes of socialism for the betterment of society.
The museum's director, Otto Neurath, was a scientist who firmly believed in the didactic force of information presented as easily surveyable visual data. An economist by training, Neurath was familiar with the results of the relatively new discipline of pictorial statistics which visually organized relations between data.
From the second half of the 19th century onward, pioneers such as the French engineer Charles Minard, and the Scottish economist William Playfair had developed new ways to relate data visually. Minard's 1869 rendering of the events of Napoleon's disastrous Russian campaign from 1812/1813 still counts as exemplary for

visual statistics today. Minard showed an abstracted map – the route Napoleon's army had followed towards and from Moscow – on which he plotted the amount of soldiers involved, weather conditions and a time line. The image dramatically conveys the main information, that the army started out almost half a million strong, and ended with a mere 10.000 men.
It was such comprehensive visual information that Neurath wanted to convey, and he developed his own system for doing so. Neurath was a member of the Vienna Circle, and he practised their philosophy of 'logical-positivism' – logical analysis based on empirical facts – in his museum. There, he developed the 'Vienna method' of presenting information in rationally organised images. Essentially, Neurath focused on rendering the correct proportions of his data at a glance. Many of his contemporaries indicated amounts and their relations by varying the size of their symbols. But according to Neurath's rules, 'more' or 'less' are not represented by bigger or smaller symbols, but by more or less symbols, each symbol representing a specific number. In this manner, relations can be read more easily and more exactly. In his representations, Neurath as it were gives the ruler, which is absent in most other methods.

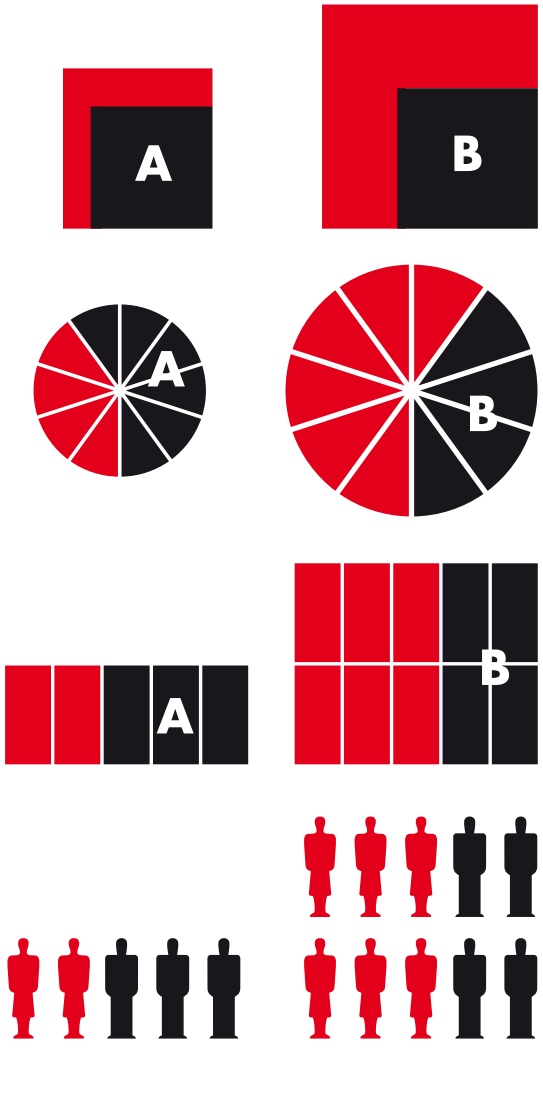
As a Marxist-inspired scientist closely connected to the radical social program of 'Red Vienna', Otto Neurath saw that, in an era of rapid industrial development and expanding international communication, there would be a growing need for accessible basic information, particularly amongst the emancipating workers' class. Together with graphic designer Gerd Arntz, he developed a set of basic pictograms, which symbolized central terms from industry, demographics, politics and economy.
These pictograms were systematically employed in stylised charts and diagrams, thus spawning the 'Vienna method' of visual statistics, later renamed ISOTYPE, International System Of TYpographic Picture Education. Neurath's and Arntz's system became an internationally emulated early example for today's infographics.

Isotype was as much a cultural project as it was a tool for communicating social and economic information. Beyond the dissemination of objective data, Neurath envisioned his system as a means to cross boundaries of culture and politics. Texts are much more open to interpretation than simple images, and they exclude those who do not master the language or who cannot read well. Thus Neurath's motto:



Napoleon's campaign in Russia 1812/13,
Charles Minard, 1869

‘words (which not everyone can read) divide, images (which can be understood by all) unite.’ This idealistic spirit of Isotype also characterizes many of the era’s other movements in the arts, politics and industry. The 1920’s and early 1930s, roughly the period between the two World Wars, were an era of optimism, despite grave economic and political problems and conflicts. A better world seemed not only necessary, but imminent if only the new insights of science and the new potential of industry would be used for the betterment of all people instead of enriching only the powerful few. Following established modernist principle, the idea was to base society and its institutions on objective information and communication, surpassing what Mondriaan– this other modernist icon – once called ‘petty individualism.’ Individualism was a dividing force – collectivism united the masses on the basis of their common interest. In this vein, Neurath’s and Arntz’s new visual language for communicating information on society, politics, economy and industry amounted to a new instrument of world peace.



Squares
One is only able to say:
2 is greater than 1
B is greater than A

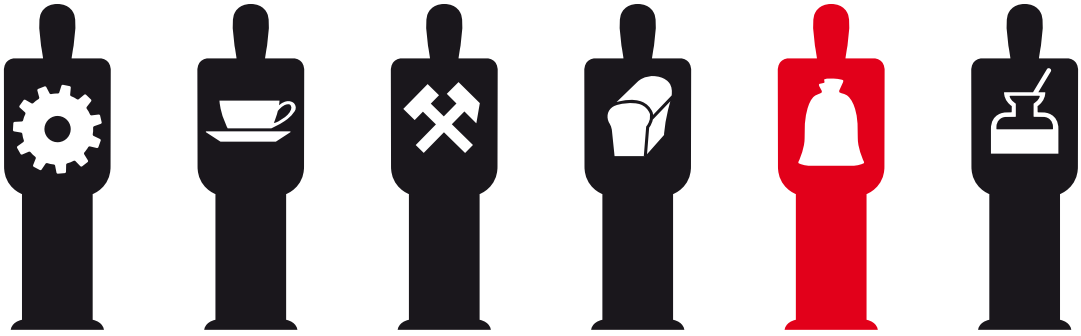
Circles
One is only able to say:
2 is greater than 1
A is 6/10 of 1
B is 4/10 of 2

Four-sided forms put together
One is now able to say:
2 is twice as great as 1
A is 3/5 of 1
B is 2/5 of 2
A is 3/4 of B

Groups of signs
One is able to say:
Group 2 is twice as great as group 1
Number of men is 3/5 of 1
(number of women 2/5 of 1)
Number of men is 2/5 of 2
(number of women 3/5 of 2)
Number of men in 1 is 3/4 of
number of men in 2
Number of women in 1 is 1/3 of
number of women in 2

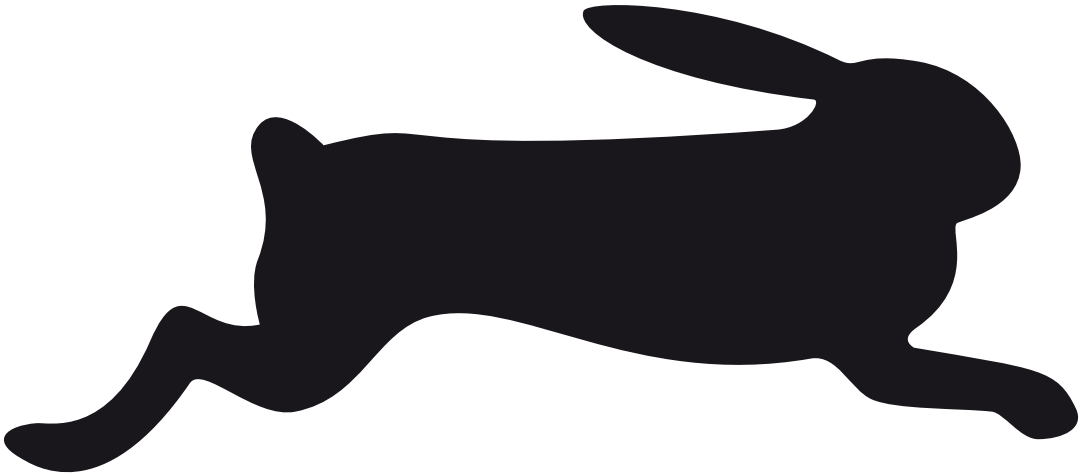
Science

Otto Neurath translated complex figures into images designed to clarify the correct proportions of the data at a glance. Many of his contemporaries rendered proportions by varying the size of their symbols. But according to Neurath's Isotype rules, more or less are not represented by bigger or smaller symbols, but by more or less symbols, each symbol representing a specific amount. In this manner, relations can be read more easily and exactly. In his representation, Neurath as it were gives the ruler, which is absent in the other methods.



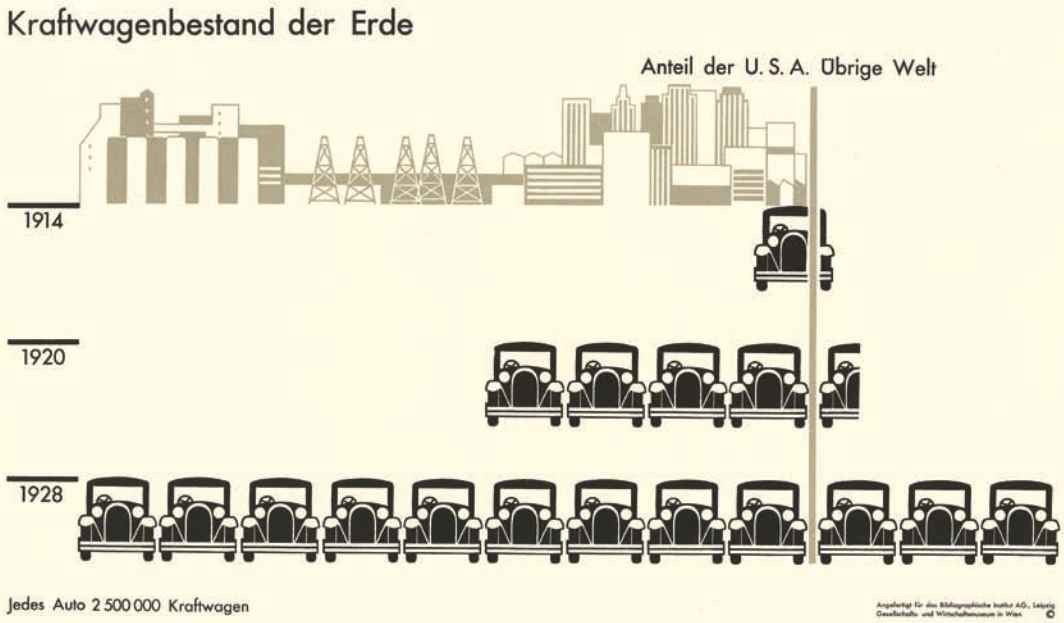
Standardisation

Apart from being the acronym of ‘International System Of TYpographic Picture Education, isotype is also Greek for ‘the same sign’. This last meaning summarizes the essence of the system: standardisation. By developing a standard for the way in which information is represented visually, Neurath changes a style of illustration into a coherent visual language: he designs a grammar and syntax, which provide strict rules for making ‘visual texts’. Because of this standardisation, generic symbols (‘man’, for instance) can, by means of small variations or additions (such as a cap or standardised signs for various industries) acquire a specific content (‘worker in the steel industry’). This way also, various data become comparable.



Simplification

Gerd Arntz, commissioned by Otto Neutrath, developed the Isotype visual dictionary, consisting of over 4000 symbols. The idea was that images can bridge differences of language, are easy to grasp and, when done well, also nice to look at. The legibility of Isotype is determined by the simplicity of its symbols. These should be instantly recognizable, without any distracting detail. What counts is the general idea – for common use the precise details are of less importance. Or in Neurath's words: 'It is better to remember simplified images, than to forget exact figures.'



Images

The Isotype symbols were not meant to completely replace words, but to summarize and support the verbal content of the statistics. Due to this visual summary, less text is needed as well – the images give the grammatical relations, so that the text can be limited to key words instead of sentences. Important for the overview is the way in which the symbols are employed within the page's grid. Here too, simplicity rules: horizontal arrangement represents changes in quantities, while vertical arrangement shows a passage of time or a comparison between various data. An accompanying illustration (Führungsbild) sometimes appears in the background of these infographics to enliven the composition and to add a geographical or content-related connotation.



Isotype symbols

Gerd Arntz designed over 4000 Isotype symbols to be used in visual statistics and infographics. The symbols reproduced on the following pages are digitally redrawn by Ontwerpwerk from Arntz's original linocuts, with added background colors (original Isotype colours combined with colors of today) and an occasional touch of white for contrast.



"There is a special sign for 'worker' and a sign for 'crafts'. If it is necessary for a worker in the crafts industry to be marked off from other workers, the sign for crafts will be put on his chest. The man is the thing and crafts is his quality. The man is the root idea and the crafts the addition." Otto Neurath, 1936

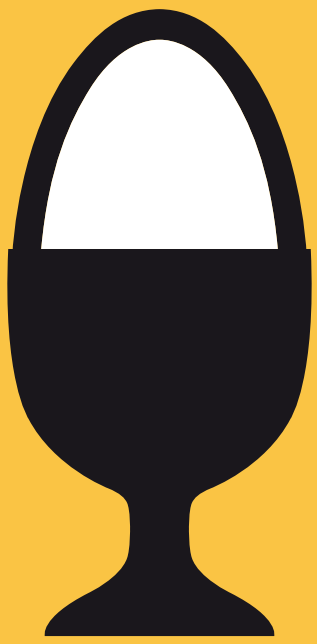








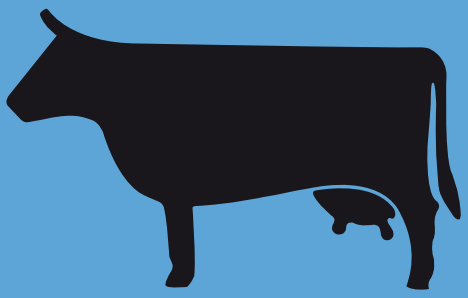






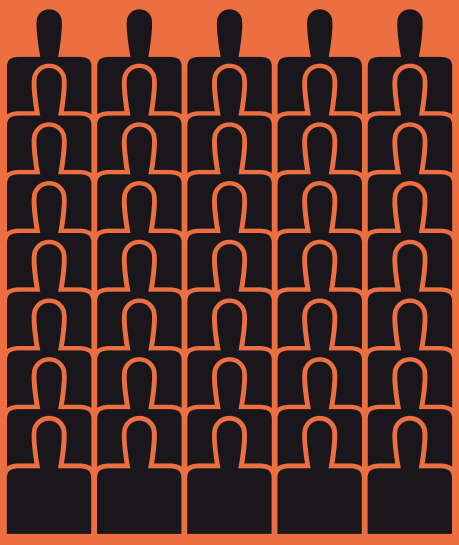
"The sign 'man' has not to give the idea of a special person with the name XY, but to be representative of the 'animal' man."
Otto Neurath, 1936







"They are based on our knowledge of the things themselves, putting weight on whatever seems important." Otto Neurath, 1936





"They have to be so simple that they may be put in lines like letters." Otto Neurath, 1936





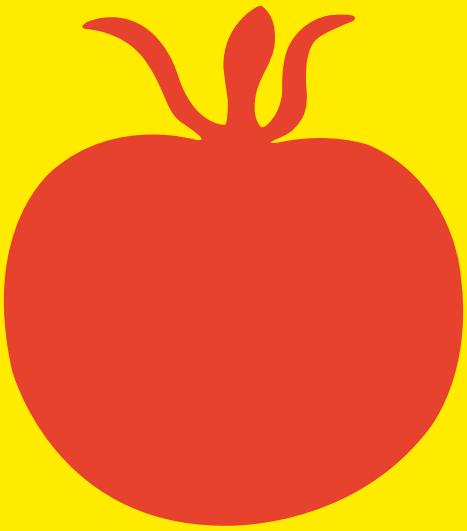
"At the first look you see the most important points, at the second, the less important points, at the third, the details, at the fourth, nothing more - if you see more, the teaching-picture is bad." Otto Neurath, 1936



"All pictures are part of a unit; they are using the same language." Otto Neurath, 1936









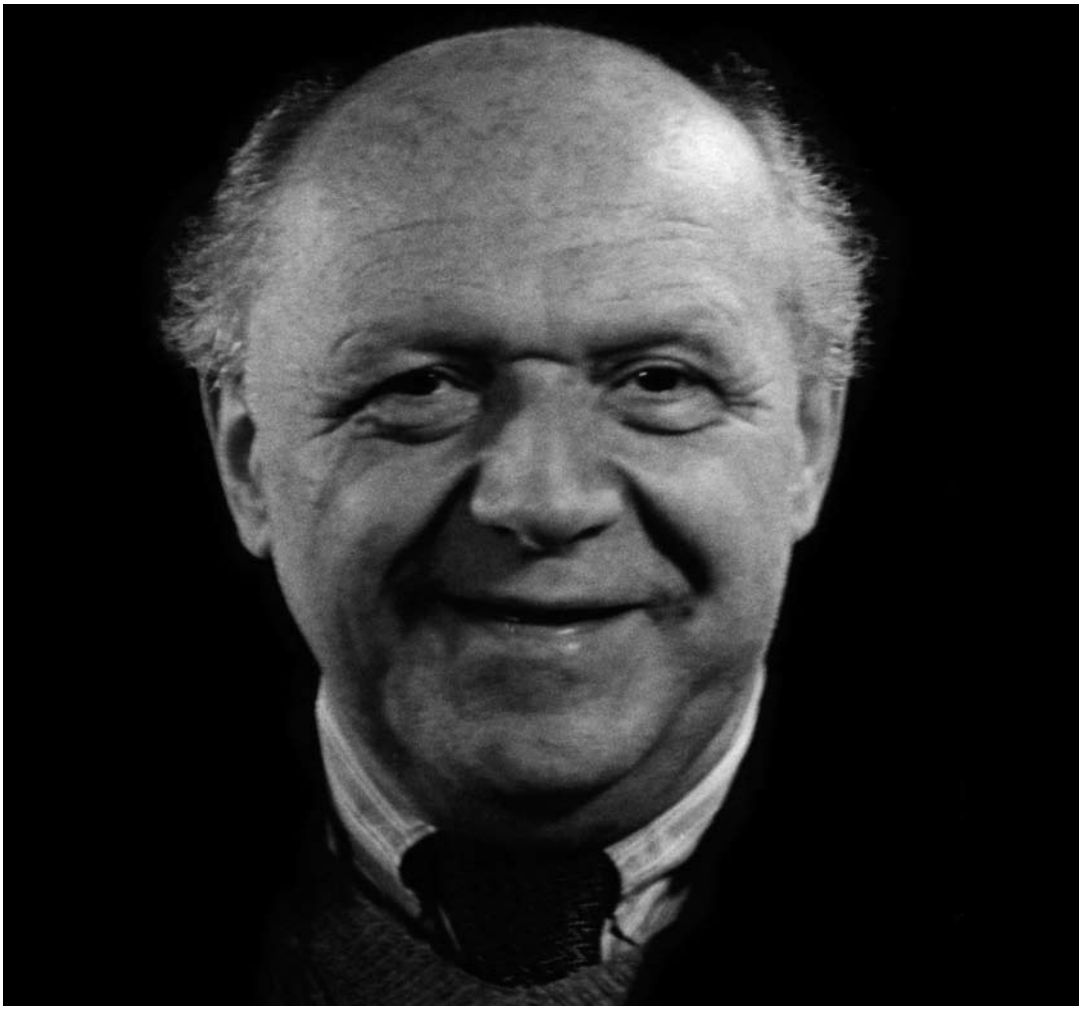






Otto Neurath (1882–1945)

Economist, social scientist, inventor of Isotype



Otto Neurath, 1945

Otto Neurath: visual statistics as picture education

From the 1920s onward, Otto Neurath developed a visual language for a pictorial statistics which he interpreted as 'picture education'. For Neurath, this was central: the images he used were created with an eye to what they were intended to achieve: to help specific segments of the population to understand complex relations in information about social and political issues. Characteristic for Neurath's 'Vienna method' of constructing statistics, which after he left Vienna was renamed ISOTYPE (*International System of TYpographic Picture Education*), was the consistent usage of standardised images of objects in combination with a carefully argued use of colour.

In developing his visual language, Neurath employed a number of principles:

-The basic images should speak for themselves and be used repeatedly, so that they would become familiar;
-In order to achieve an undisturbed composition, the basic images should be in black and white whenever possible;
-Other images should use a limited spectrum of colours;
-The compositions should be laid out without perspective, which would distort the basic images and diminish their legibility;
-The basic images should be easy to combine. The image for 'shoe', for instance, would be combined with that for 'factory' to form the symbol for 'shoe factory';
-In quantitative statistics, the basic image would represent an amount, which was varied by adding more or less of the basic image. The image itself would always be at the same size;
-Numbers, other than for years, should be avoided as much as possible;
-Visual statistics should be readable like a book, which means from left to right, top to bottom;
-Images representing amounts were used diachronically and synchronically;
-When analysing developments or characteristics of countries, geographical maps were used as background;
-Each chart should tell a story.

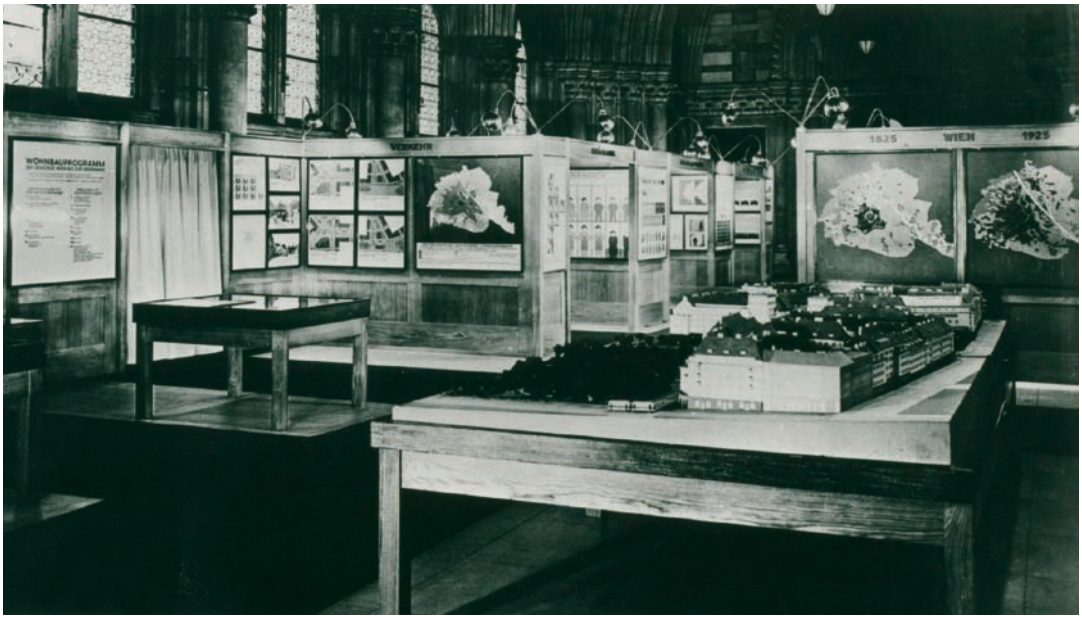
Neurath's pictorial statistics are closely connected to the *wissenschaftliche Weltauffassung* (scientific world view) of the 'Wiener Kreiss' (Vienna Circle), a famous group of scientists who saw logical analysis of reality as the central source of all knowledge. In this 'logical-positivist' vein, visual statistics represented empirical accounts of the state

"Museums are not for experts, they are for the public."
Otto Neurath, 1936

of the world, communicated in clear terms and by transparent reasoning. For Neurath, who has been called an 'enlightener' because of his insistence on experience and rationality as necessary basis for meaningful statements, picture education was also connected with political awareness and a tool for responsible social action. In addition, he was focused on communication across boundaries of language and culture, a reason to characterize him as 'internationalist' – or an early 'globalist' – as well. All this was connected with his underlying aim of fostering enduring world peace.

In order to achieve these goals, Neurath consistently argued the case for an accumulation of knowledge resulting from the collaboration of scientists of different disciplines. Not because he believed that science could be reduced to a single scheme, but because he wanted to stimulate exchange and awareness of approaches and results between the sciences. Hence his reference to 'unified science.' Neurath meant 'unification' in terms of 'orchestration', a concept he thought would be fitting for a democratic society. Neurath was keenly interested in the social development in terms of statistical data; he was less concerned with individual lives than with the development of collectives. The lives of individuals could only be fully understood when embedded in the context of the group of which they were a part. The task of statistics was to enliven dry numbers and facts and present them in a way that increased insight while pleasing the eye.

Neurath's work on visual statistics started with the foundation of the *Gesellschafts- und Wirtschaftsmuseum* in Vienna, supported by the socialist city government in January 1925. The aim was to develop the 'museum for the future', with enlightening pictorial exhibits about the development of human society and the forces influencing it. In this museum, Neurath developed his method which he later termed the 'Vienna method of visual statistics'. The content of these 'visuals' required scientific knowledge, but the design of consistent and artistically valid images demanded a different expertise. The aesthetic development of Neurath's visual statistics was greatly stimulated by the German artist Gerd Arntz, who became a member of Neurath's central team in 1929.
Marie Reidemeister, Neurath's later wife, was already part of that team, which was governed



| Exhibition with visual statistics in the town hall of Vienna, 1927



In Neurath's Mundaneum office, Obrechtstraat 267, The Hague, 1939.
Left to right: Marie Reidemeister, Otto Neurath, Josef Scheer, Gerd Arntz

"Teaching through the eye is today becoming more and more important."
Otto Neurath, 1936

by a strict division of labour. The scientists (Neurath and assistants) were responsible for collecting the data; a second task, performed by Reidemeister, was to transform this material into guidelines for the design of the images; the third task, which fell to Arntz, was to design the symbols and general lay-out of the graphics, while a fourth group of assistants was responsible for the technical realisation and reproduction.

For Neurath, the idea was not so much that visual language would replace written words altogether, but to support it and replace it whenever images would be more informative than words. Texts are, for instance, not the best way to elucidate complex relations in which quantities and qualities should be combined. Carefully crafted images are much more effective than complex texts, especially when the aim is to reach large parts of society and give them a clear insight into circumstances, relations and developments – which would enable them to better participate in political life. That is why Neurath spoke of 'picture education'. Images, thus Neurath, are better at depicting a 'state of affairs'. Didactically, he maintained, it is better to 'picture the forest first, and then outline the trees.' And since words can be interpreted in a great variety of ways, and thus easily lead to disparity, Neurath held that "words divide, images unite". In his view, images are more powerful in bringing about consensus.

Through his historical studies, Neurath had become acquainted with Egyptian hieroglyphs. Since these signs were close to reality, Neurath believed them to be stronger in communicating its content. His visual statistics were Neurath's contemporary analogon for this hieroglyphic quality. Words and numbers can be quite precise in giving a detailed account, but what's he use of that, when no-one really remembers that precision? Neurath preferred a memorable image of the gist of information over the precision of words which would soon be forgotten. His visual statistics practise the art of reduction. Visual language, according to Neurath, served to condense information for an educational goal: to provide insight, which the beholder could memorize. It led him and his collaborators to devise their own visual language, which demanded a standardisation of symbols which served as smallest measurements.

Next to working on his visual statistics, Neurath collaborated with the English linguist and philosopher Charles Kay Ogden, who had proposed a 'Basic English' to ameliorate international communication. 'Basic' was an acronym for 'British American Scientific International Commercial', and comprised a collection of 850 words that would enable complete communication. Ogden's acronym inspired Neurath to find his own, with Isotype. In 1936, Neurath published a booklet about visual statistics, with a thorough explanation of its background and system, written in Basic English.[1] The publication established visual statistics internationally and Neurath could hope that, together with Basic English, it would greatly improve communication world-wide.

Visual statistics brought Neurath around the world, when interest in the subject soared in the 1930s. In 1931, the same year he had been in Amsterdam for the World Congress on Social Economic Planning, Neurath was invited to Moscow to organise an institute for visual statistics there. Isostat, the new institution, was based on the Vienna Method and aimed at communicating the results of the first five-year plan to the Soviet population. Neurath, Arntz and Reidemeister directed 50 to 70 collaborators during regular visits to Moscow, until 1934, when the Soviet authorities took matters in their own hands. The production of the Russian variety of visual statistics continued and was shown, for instance, at the USSR pavilion during the World Exhibitions of 1937 in Paris and 1939 in New York.

In 1934 Neurath emigrated to the Dutch capital of The Hague due to the rise of Nazism in Austria, and the fall of the socialist government of Vienna. With foresight, he had initiated a foundation for visual statistics in the Netherlands already in 1932. After his arrival, Neurath was received by the Dutch Industrial Relations Institute, but he soon founded his own organisation. His work was also remarked in Sweden and England, and in the United States Rudolph Modley founded a similar institute to develop the American variant of visual statistics. Much of Neurath's work on visual statistics in The Hague was made possible by financial support and commissions for specific statistics from the US, and he regularly travelled there.

From behind his typewriter in The Hague, Neurath continued to stimulate communication between scientists of all walks, especially

since the Vienna Circle had been dispersed by the Nazi take over in Austria. In the name of 'Unified Science' he organised a number of international congresses on the state of affairs in the sciences, for which he personally invited such prominent scholars as Niels Bohr and Bertrand Russel. A permanent platform for this endeavour was the magazine 'Erkenntnis' and the public response to Neurath's organisational commitment to congresses in Paris (1935 and 1937), Copenhagen (1936), Chicago (1936), Cambridge (UK, 1938) and Cambridge (Mass. USA, 1939) shows that he was quite successful in his quest to continue the debates of the Vienna Circle. In 1940, Neurath and Marie Reidemeister emigrated again to evade the Nazis, this time to Oxford, where they married. While Gerd Arntz remained in the Netherlands, working for the Dutch Foundation for Statistics, Neurath continued his work on visual statistics in England and founded the Isotype foundation. After Neurath's premature death at only 63 years of age in 1945, Marie Neurath took over the work and his legacy.

This article is a summarized translation of 'Otto Neurath's beeldstatistiek is beeldpedagogiek' in: Ferdinand Mertens, 'Otto Neurath en de maakbaarheid van de betere samenleving', SCP-essay, The Hague 2007)

[2] Otto Neurath, International Picture Language. The first Rules of Isotype. London 1936.







Gerd Arntz (1900-1988)

Graphic artist and Isotype's design director



Gerd Arntz draws the symbol ‘unemployed’, 1931

Gerd Arntz, Isotype's design director

In 1926, Otto Neurath's Gesellschafts- und Wirstschaftsmuseum takes part in an international exhibition on the subject of "health, social care and gymnastics" in Düsseldorf, Germany. At the same time, the young communist Gerd Arntz, a self-styled artist connected to a group of progressive artists from Cologne, presents his latest work there, in which he criticises class society in wood-cuts such as 'Mitropa'. Although at the time Arntz is unaware of Neurath's theories, his style mirrors the Viennese economist's principles of clarity and 'legibility'. Neurath visits Arntz's exhibition and immediately sees the potential of this young artist for his own work. He arranges to meet Arntz in his studio and invites him to join his team. In 1929, Arntz is definitively appointed to the Gesellschafts- und Wirtschaftsmuseum and moves to Vienna.

Arntz soon becomes involved, not only in making exhibitions but also in designing the first visual statistics to be published in books or collections of prints. Most notable is the loose-leaf collection of a hundred infographics in the 'Atlas Gesellschaft und Wirtschaft' of 1930. Meanwhile, he is extending the range of basic symbols for what is to become Isotype, the standardised system for pictorial statistics. All in all, Arntz will draw some 4000 symbols for this system, which have become benchmarks of pictogram design for later generations of designers. The finely drawn symbols which Arntz developed for Isotype are all executed as linoleum cuts, a technique Arntz introduced to the museum's studio. The precision of the craft work can be clearly seen in the original linos, in which the traces of the gouge give the image an expressive character that has completely disappeared in the actual print. A symbol, after all, must be objective and neutral.

Neurath's staff counted between 20 to 25 people at the time, 3 to 6 of which worked in the drawing department where Arntz acted as design director. Arntz's designs were transferred by calqued paper onto the linoleum, cut out and then sent to the in-house printers'. Outlining the lay-outs and inserting texts and symbols was the task of assistants, among which were frequently students of the Bauhaus, where Neurath occasionally lectured.

In February 1934, the Austrian Nazi's oust the socialist government of Vienna, and Neurath and Arntz and their families leave the country and

emigrate to The Hague, the Netherlands, where Neurath has meanwhile set up an extension of the Vienna Museum, the Mundaneum Foundation. By then the museum's content has been evacuated and the collection is later transported to The Hague as well. For their work on visual statistics and with the help of Dutch colleagues, the Austrians establish the Dutch Foundation for Statistics.

During the war, after Neurath and his partner Marie Reidemeister have fled to England, Arntz continues to work for the Dutch Foundation for Statistics, which initiates several publications of visual statistics on 'Prosperity and industry in the Netherlands'. After the war, the foundation more and more focuses on consumer and market research, working mainly in commission for industrial and government clients.

Twelve years with Otto Neurath and another twenty-five years with the Dutch Foundation for Statistics have resulted in a vast body of work and a great variety of symbols and illustrations. In 1976 this extended part of Gerd Arntz's oeuvre is entrusted to The Hague's Municipal Museum, where Flip Bool and Kees Broos organise a first overview in their exhibition 'Gerd Arntz – critical graphics and visual statistics,' followed in 1980 by a more extensive selection of 'Symbols for education and statistics' in a book by Broos, published by Mart. Spruijt printers.
Gerd Arntz dies in The Hague in 1988.

This article is based on an unpublished biographic essay by Peter Arntz, 2007



Mitropa *Gerd Arntz* 1925

At 25, Arntz depicts the division between rich (against a clear background) and poor (in a gloomy environment). With its four classes, the 'Mid-Europe' train symbolizes class society. The railway sign above the left carriage says 'stop here', while the sign on the right signals 'continue on'. This was one of Arntz's prints which Neurath saw in 1926, and which convinced him that this artist, with his trimmed down realism, was just the man for him.



Linoleum-cuts and prints of Isotype symbols by Gerd Arntz, 1930's, from the Arntz archive, now at the Municipal Museum, The Hague. The original linos show the precision of the craft work in the expressive traces of the gouge. The prints next to them are proofs made by Arntz. In the symbol for 'reader', note the modern chair – the silhouette of Mies van der Rohe's cantilever chair from 1927. This chair became a symbol for modernism by itself.


246
INTERN
VISUA
232 Ba
OF
D)


R
15





Gesellschaft und Wirtschaft

Bildstatistisches Elementarwerk

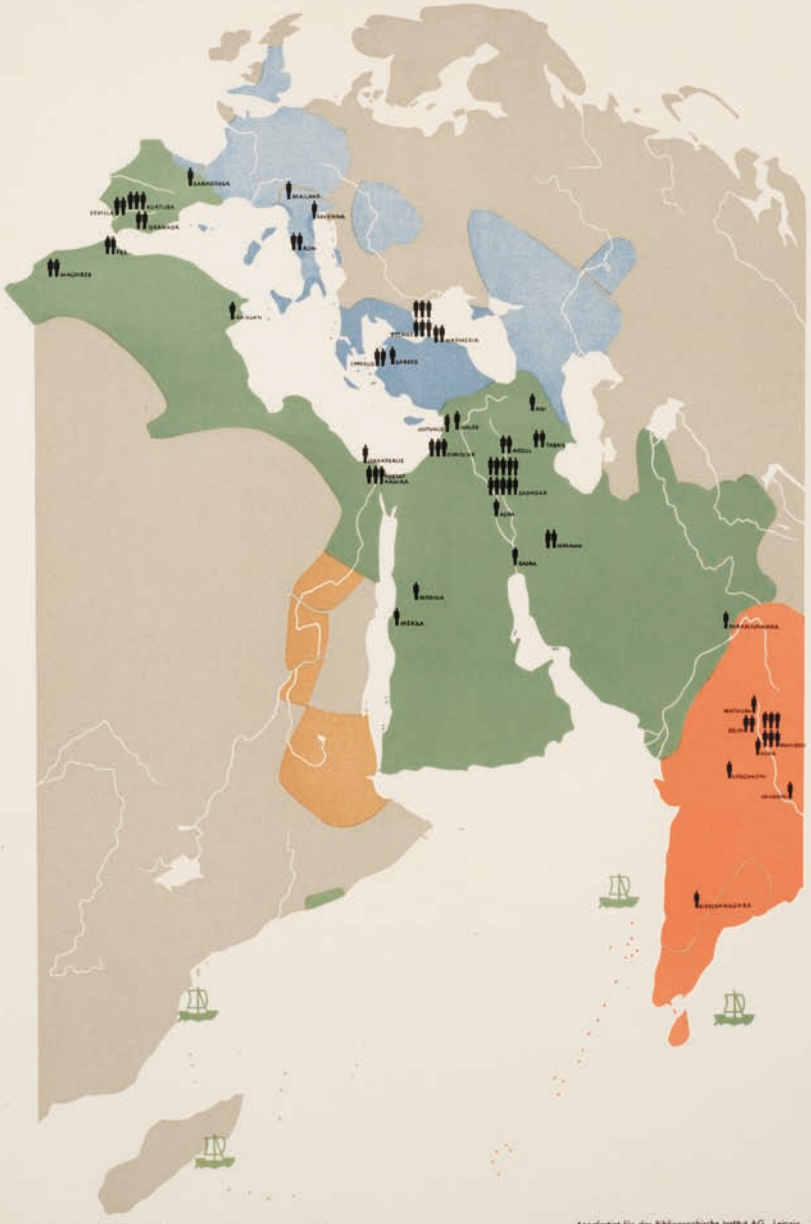
The atlas 'Society and Industry' is a loose-leaf collection of visual statistics printed and published in Leipzig, 1930, and issued by Otto Neurath's eponymous museum as a showcase for the Vienna method – hence its subtitle: "elementary visual statistics". Together, these graphics in Gerd Arntz's austere design provide an overview of the essential empirical data of the world. The populations of countries and continents, world powers and their political and military relations, trade and industry, the growth of cities and their social structure and workers' conditions, everything is orderly visualized in directly recognizable diagrams. The atlas is a text book example of the Vienna method of presenting generally accessible information regardless of language barriers with the aid of images.

On the following pages a selection of graphics from this collection.

The Arab world and neighboring countries

The Islamic Arab Empire around 750 AD is rendered in green. The Iberian peninsula is largely under Moorish rule and Turkey still belongs to Europe. Byzantium and Baghdad are among the largest cities of the time. Interestingly, Arntz leaves the sphere character of the globe intact, and tilts the map a bit, to fit everything he wants to show in this graph.

Araberreich und Nachbargebiete: Städte



Jede Figur 100 000 Einwohner. Grenzen um 750

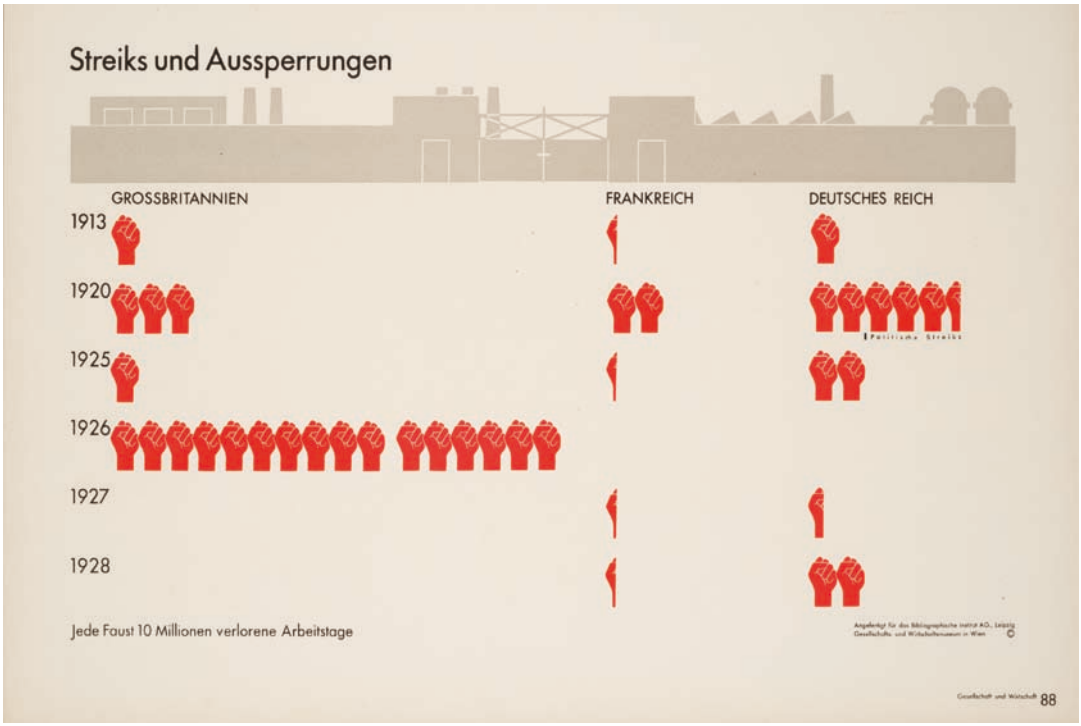
Angefertigt für das Bibliographische Institut AG., Leipzig
Gesellschafts- und Wirtschaftsmuseum in Wien ©

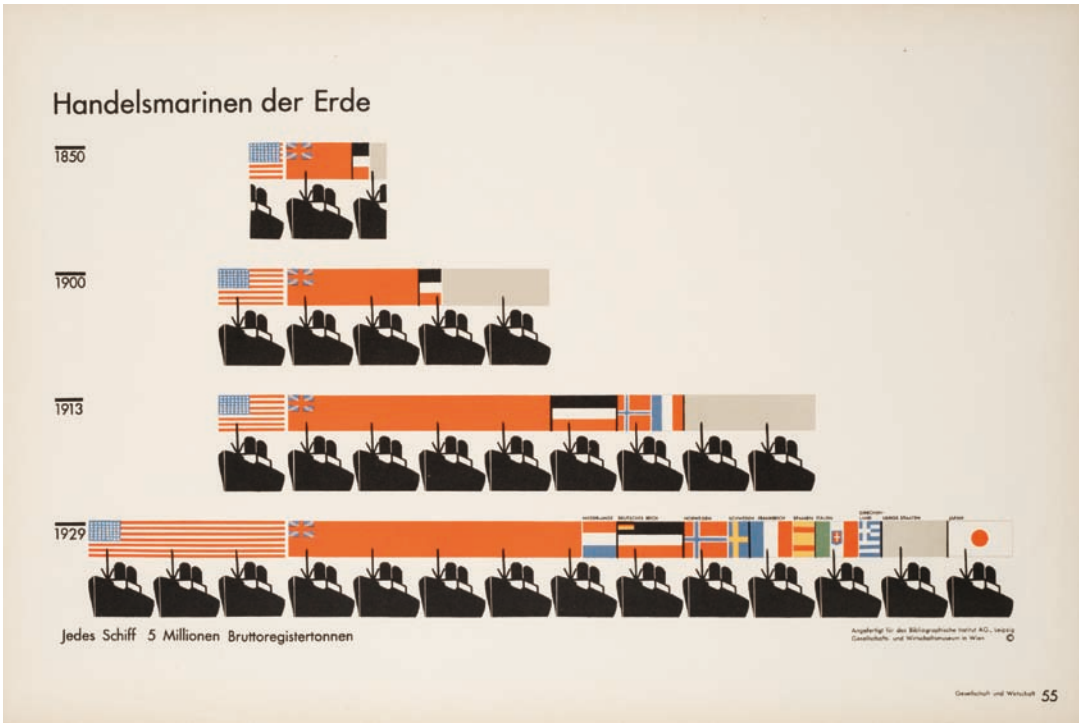
Strikes

Against the background of abstracted factories, workers of all nations raise their fists united. This chart shows the vagaries of workers' unrest over several years in various countries.

Commercial fleets of the world

A parade of flags flying above though ships symbolizes the rampant growth of commercial shipping at a time when Great Britain still ruled the waves. The flags, with their recognizable forms and clear colors lend themselves well for rendering information in an 'isotypical' way.


Streiks und Aussperrungen
GROSSBRITANNIEN
FRANKREICH
DEUTSCHES REICH
1913
1920
1925
1926
1927
1928
Jede Faust 10 Millionen verlorene Arbeitstage
Gesellschaft und Wirtschaft 88

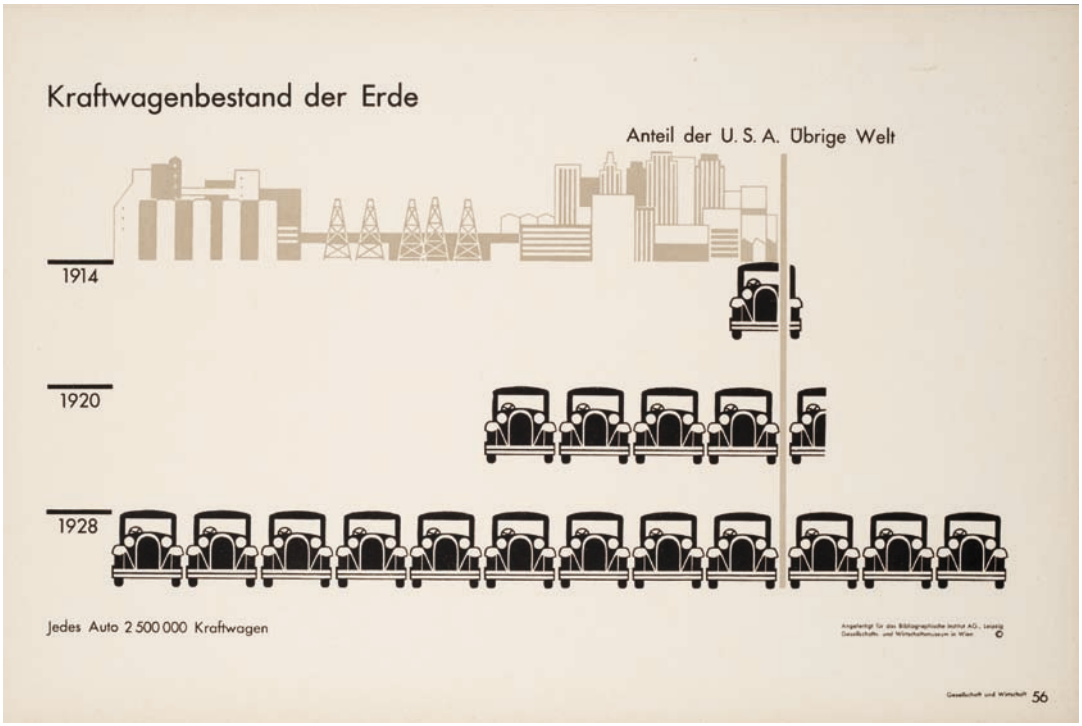

Handelsmarinen der Erde
1850
1900
1913
1929
Jedes Schiff 5 Millionen Bruttoregistertonnen
Gesellschaft und Wirtschaft 55

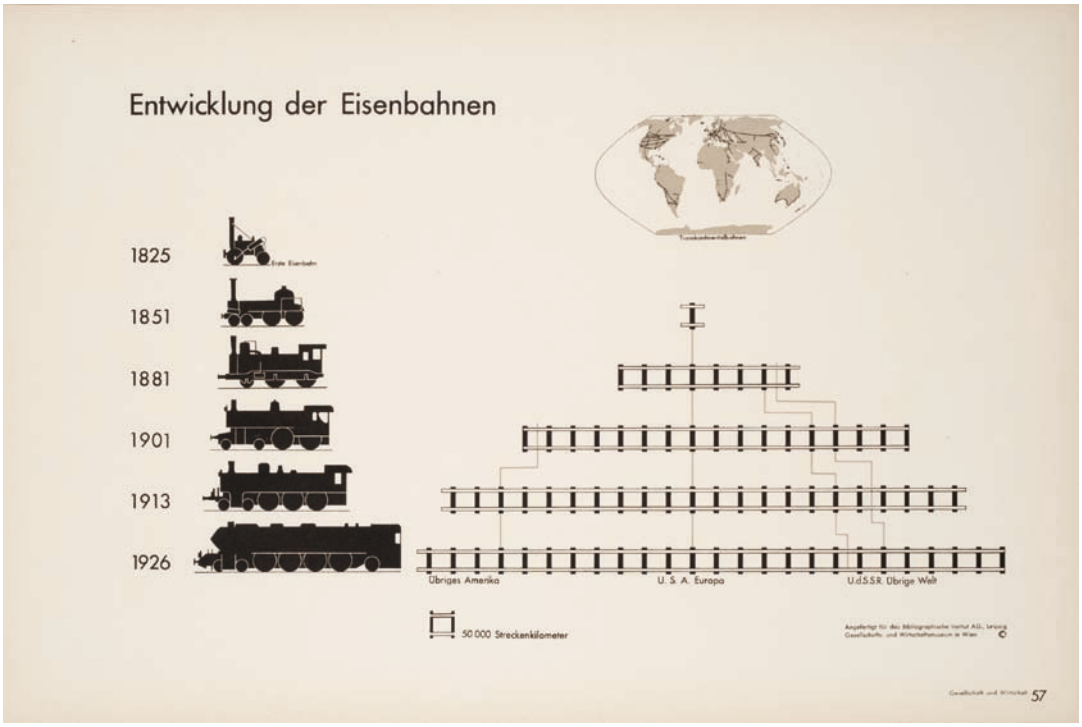
Car ownership in he world

Interesting in this graph from our perspective is that the steering wheels of Arntz's symbolized cars are on the right, and not on the left, as would be the case for the USA at least. In a large part of Austria, including Vienna, traffic was driving left at the time. After the Nazis took over Austria in 1938, this changed, and now also all of Europe, with the exception of the United Kingdom, drives at the right.

The development of railways

Interesting in this image is that, with his stylized locomotives, Arntz depicts not only the growth of railways over several decades, but also the modernization of its rolling stock.


Kraftwagenbestand der Erde
Anteil der U. S. A. Übrige Welt
1914
1920
1928
Jedes Auto 2 500 000 Kraftwagen
Gesellschaft und Wirtschaft 56

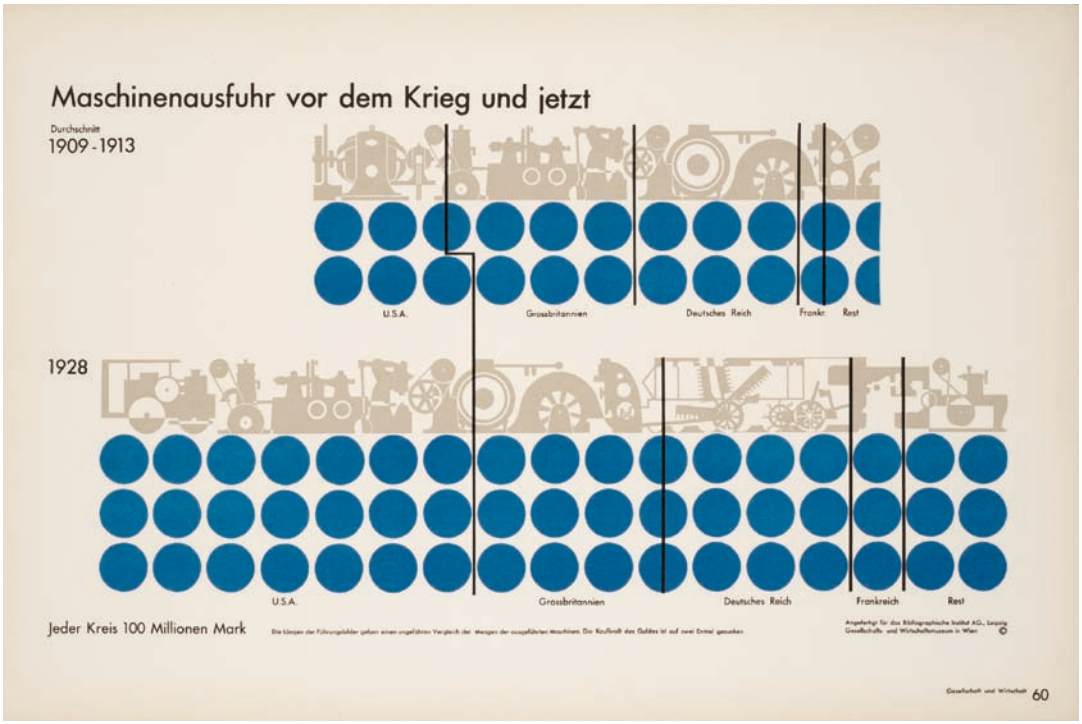

Entwicklung der Eisenbahnen
1825
1851
1881
1901
1913
1926
Übriges Amerika
U. S. A.
Europa
U.d.S.S.R.
Übrige Welt
50 000 Streckenkilometer
Gesellschaft und Wirtschaft 57

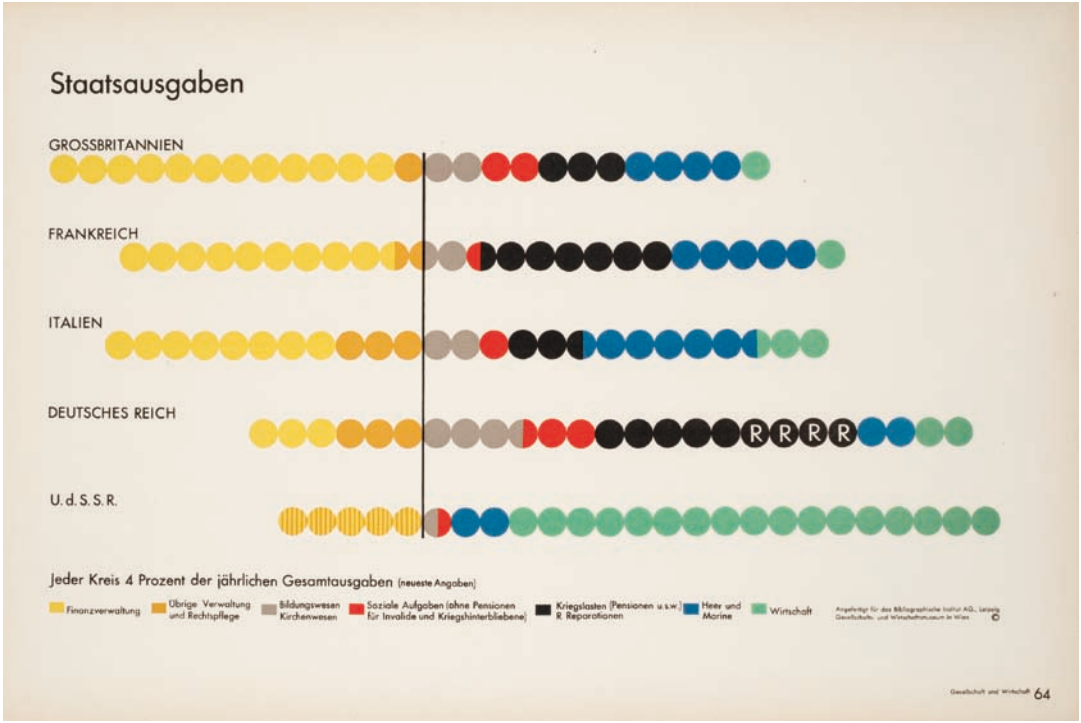
Machinery exports before and after the war

In a footnote, Neurath issues a subtle warning not to misread this chart. It shows that, for instance, Great Britain has exported about as much heavy machinery before the First World War as it does in 1928. They seem to be making much more money with this, but only at first glance: the fact that the gold price plummets with a third during the intermittent decade, indicates that the apparent profits have been annihilated by inflation.

State spending

One of the more complex charts in this collection, also because of the choice for ‘4%’ as smallest measurement. In any case, it clarifies that, almost ten years after the end of World War I, Germany is still spending 36% of it’s national income on social benefits and reparations resulting from that war. Also apparent is the large share of the Soviet government in the national economy, and the heavy weight of he British bureaucracy.


Maschinenausfuhr vor dem Krieg und jetzt
Durchschnitt
1909-1913
U.S.A.
Grossbritannien
Deutsches Reich
Frankr.
Rest
1928
U.S.A.
Grossbritannien
Deutsches Reich
Frankreich
Rest
Jeder Kreis 100 Millionen Mark
Gesellschaft und Wirtschaft 60

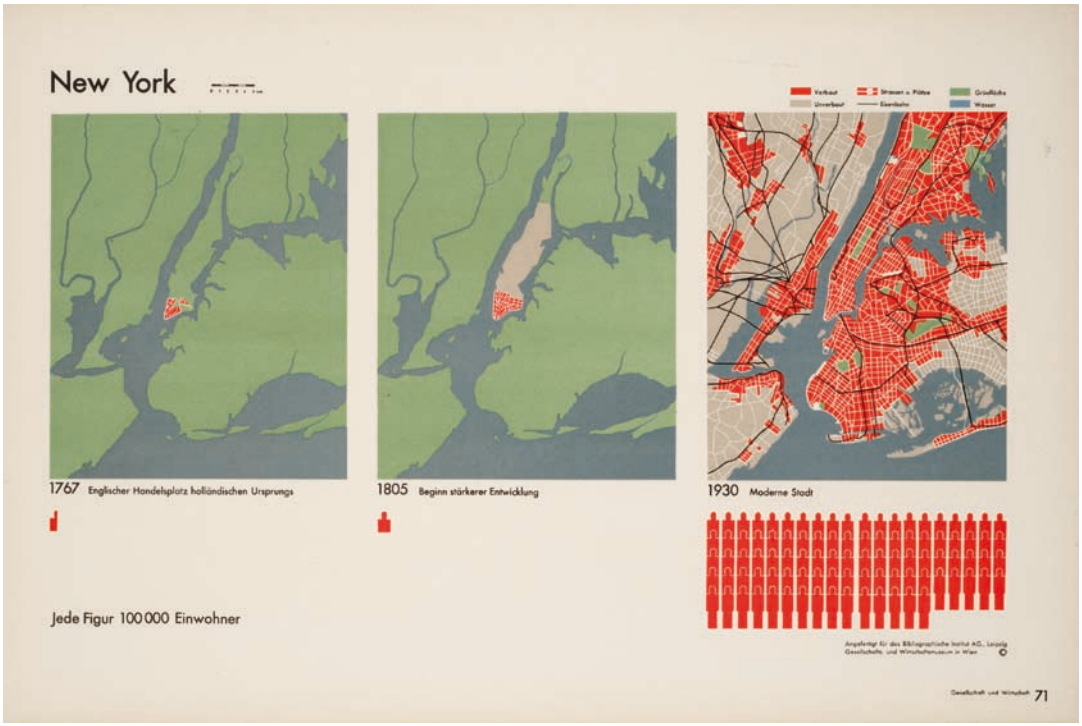

Staatsausgaben
GROSSBRITANNIEN
FRANKREICH
ITALIEN
DEUTSCHES REICH
U. d. S. S. R.
R R R R
Jeder Kreis 4 Prozent der jährlichen Gesamtausgaben (neueste Angaben)
Finanzverwaltung
Übrige Verwaltung und Rechtspflege
Bildungswesen Kirchenwesen
Soziale Aufgaben (ohne Pensionen für Invalide und Kriegshinterbliebene)
Kriegslasten (Pensionen u.s.w.) R Reparationen
Heer und Marine
Wirtschaft
Gesellschaft und Wirtschaft 64

New York

The development of a world metropolis in a nutshell: from 25.000 inhabitants to 9.5 million within a century and a half. To go by the chart, Neurath has counted in New Jersey and other urban areas neighboring New York, because the official population of New York in 1930 was 6,930,000.

Population density in major cities

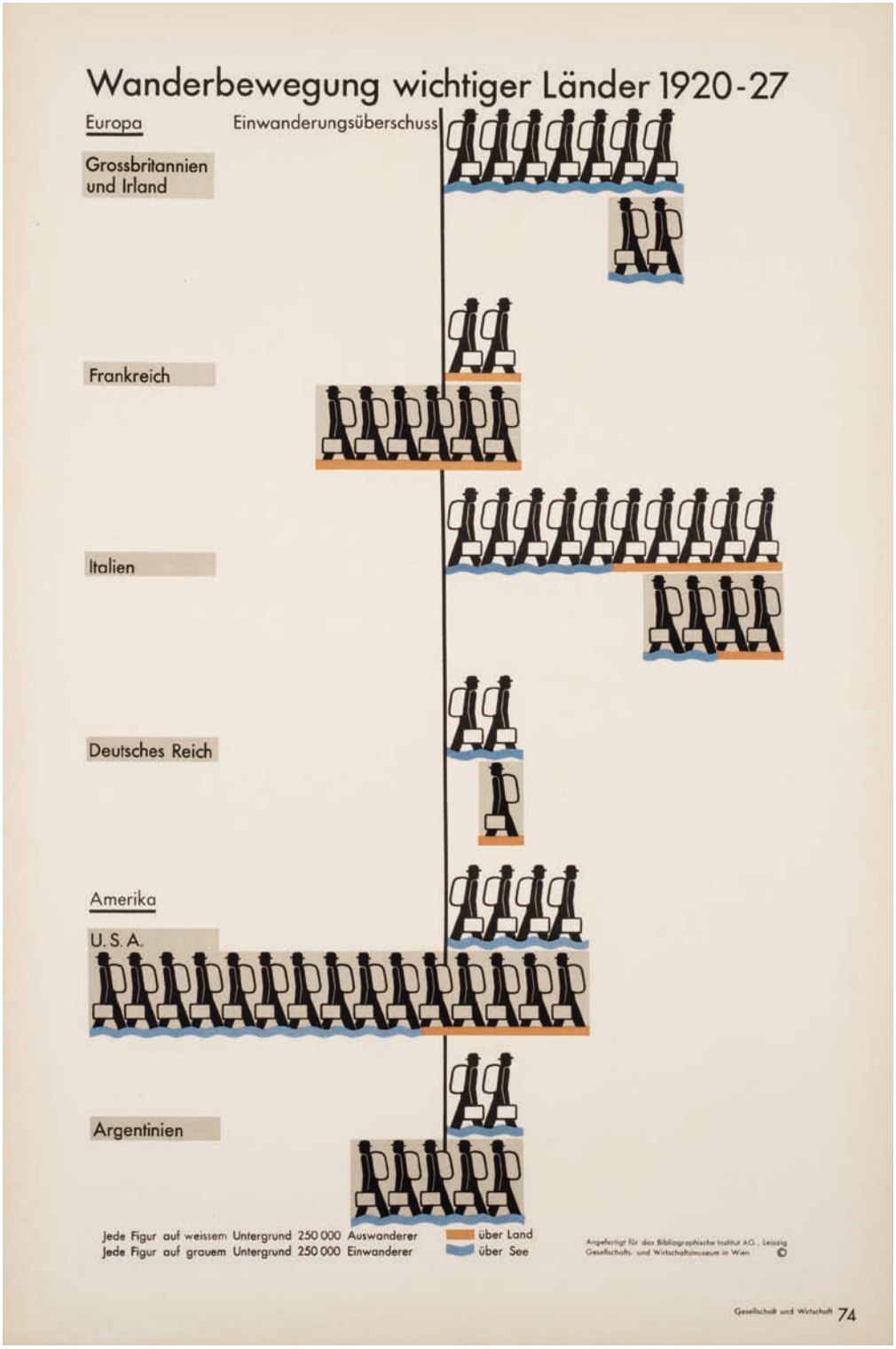
Density of population rendered as the amount of inhabitants per modern looking housing block. Remarkable is the fact that European cities are dramatically denser than American cities. Social housing was Neurath's first subject for visual statistics, connected as he was to Vienna's revolutionary housing program.


New York
1767 Englischer Handelsplatz holländischen Ursprungs
1805 Beginn stärkerer Entwicklung
1930 Moderne Stadt
Jede Figur 100 000 Einwohner
71


Wohndichte in Großstädten
Bewohner auf 200 m² verbauter Fläche (Gebäudegrundstücke einschl. Strassen, ausschl. grosser Parkanlagen)
Einige Weltstädte
New York
London
Paris
Berlin
Chicago
Wien
Die deutschen Großstädte über 400 000 Einwohner
Berlin
Hamburg
Köln
München
Leipzig
Dresden
Breslau
Frankfurt a. M.
Essen
Düsseldorf
Hannover
Anordnung der Städte nach ihrer Grösse. Anfang 1929
72

Migration in major countries, 1920-27

Chains of men, packed with their belongings travel by land and sea in and out of countries. The visual organization of this chart allows the reader to see that between 1920 and 1927 about 3 million more people entered the USA than emigrated from it.


Wanderbewegung wichtiger Länder 1920-27
Europa
Einwanderungsüberschuss
Grossbritannien und Irland
Frankreich
Italien
Deutsches Reich
Amerika
U. S. A.
Argentinien
Jede Figur auf weissem Untergrund 250 000 Auswanderer
Jede Figur auf grauem Untergrund 250 000 Einwanderer
über Land
über See
Angefertigt für das Bibliographische Institut AG., Leipzig
Gesellschafts- und Wirtschaftsmuseum in Wien ©
Gesellschaft und Wirtschaft 74

Unemployed

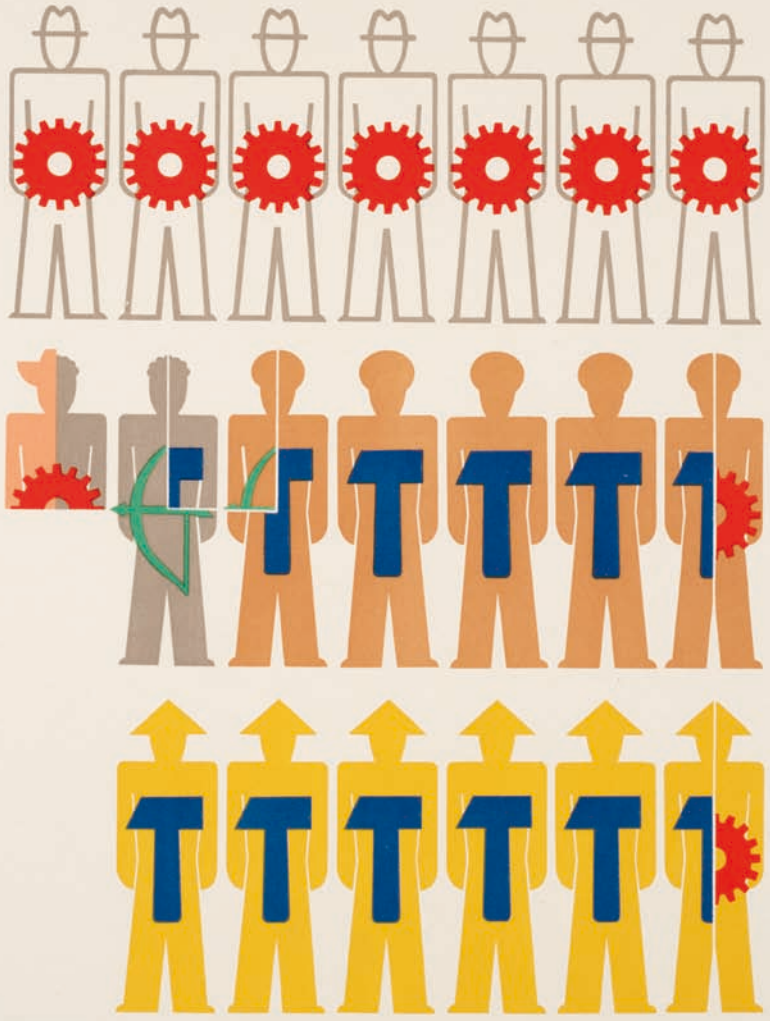
As the icons for unemployed are rendered here, they conjure up the image of long queues in front of the welfare office. Remarkable in this chart is that in France there seems to be no unemployment since 1920.


Arbeitslose
GROSSBRITANNIEN
FRANKREICH
DEUTSCHES REICH
1913
1920
1925
1926
1927
1928
Jede Figur 250 000 Arbeitslose
Angefertigt für das Bibliographische Institut AG., Leipzig
Gesellschafts- und Wirtschaftsmuseum in Wien ©
Gesellschaft und Wirtschaft 87

Economic activity in the world

Man and industry in one image: the regions of the world are indicated by the typical headgear of their populations, while the various industries - 'primitive', 'traditional' and 'modern' - are symbolized by signs for bow-and-arrow, hammer and cogwheel respectively.

Wirtschaftsformen der Erde



Zahnrad: Moderne Wirtschaft (Industrie im Vordergrund)
Hammer: Altkulturwirtschaft (Handwerk und Ackerbau entwickelt)
Pfeil und Bogen: Primitive Wirtschaft (Sammeln, Jagen, primitive Landwirtschaft)

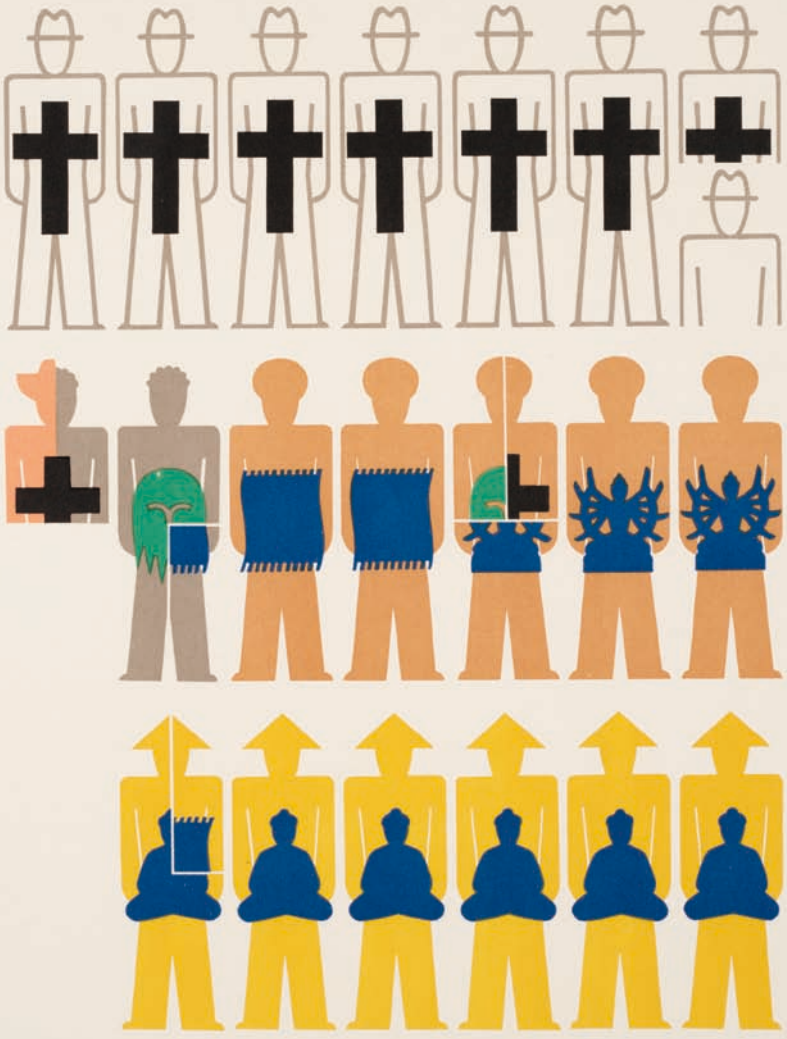
Jede Figur 100 Millionen Menschen Schätzung für 1930

Angefertigt für das Bibliographische Institut AG., Leipzig
Gesellschafts- und Wirtschaftsmuseum in Wien ©

The world's religions

A complex graph, because the world's religions are not equally divided over the various races. Of the 'negros', for instance, 75 million adhere to a 'primitive cult', 25 million are 'Mohammedan' and another 25 million are Christians. Remarkably, the 50 million (white) people without sign (i.e. without creed) are characterized as 'atheists, liberals and Jews'. This is most likely because the Jews are too small a group to indicate with a separate sign.

Religionen der Erde



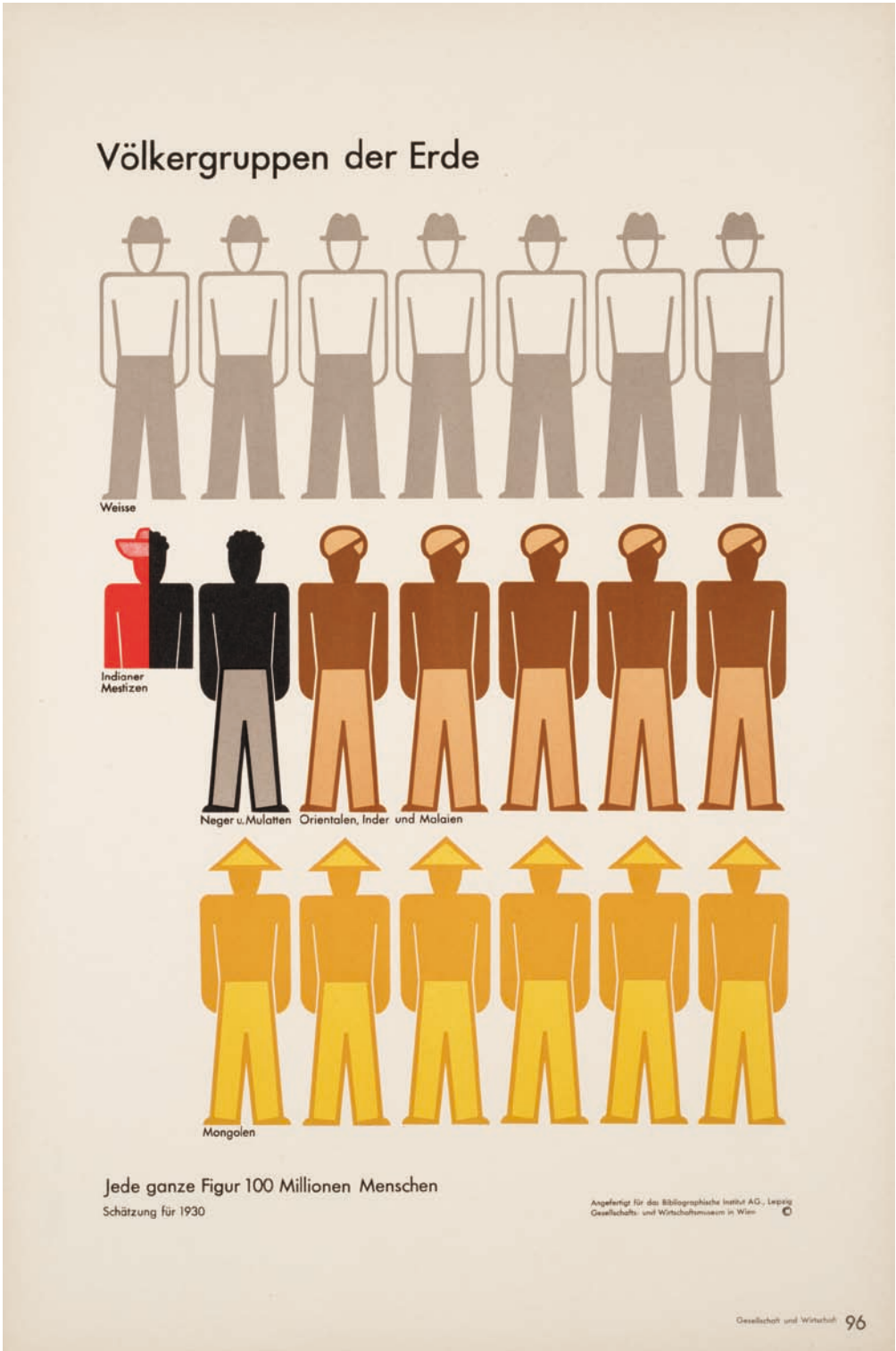
Kreuz:	Christen	Gebetteppich:	Mohammedaner
Ohne Zeichen:	Religionslose, Freidenker, Juden	Vielarmige Gottheit:	Hinduisten
Maske:	Primitive Kulte	Sitzende Figur:	Ostasiatische Religionen, einschliesslich Buddhismus

Jede Figur 100 Millionen Menschen Schätzung für 1930

Angefertigt für das Bibliographische Institut AG., Leipzig
Gesellschafts- und Wirtschaftsmuseum in Wien ©

The world's ethnicities

Statistics is the art of summary and it makes good use of clichés. In this case by categorizing under 'Mongols', rendered as a figure in a typical Chinese attire, also Koreans, Japanese etceteras. And while 'negros and mulattos' wear only their curled hair, the other races are characterized by their typical headgear. Adding up the figures shows that the world counted less than 2 billion people in 1930.


Völkergruppen der Erde
Weisse
Indianer
Mestizen
Neger u. Mulatten
Orientalen, Inder und Malaien
Mongolen
Jede ganze Figur 100 Millionen Menschen
Schätzung für 1930
Angefertigt für das Bibliographische Institut AG., Leipzig
Gesellschafts- und Wirtschaftsmuseum in Wien ©
Gesellschaft und Wirtschaft 96


KEEP DRY





Timeline (1920-2007)

The following pages can be read as a diagram of an accelerating and thickening information culture. The timeline lists developments from the 1920s till today which have had their impact on how we communicate – visually and otherwise –, in the context of major events through the years. From Neurath's and Arntz's simple Isotype graphs to the multimedia environments which symbolize the future of ubiquitous information. The diagram also shows that when looking back, we are better able to choose what seems important, but at the same time we loose detail and colour. The fine maze of today's reality is coloured by our proximity to the facts. The nearer to our own time, the more detailed this barcode of history becomes.

The collected facts are a personal choice of the editors.



1920 The NSDAP raises the Swastika flag.
1923 The first radio broadcast in the Netherlands.
1925 Mussolini announces he is taking dictatorial powers over Italy.
1928 Mickey Mouse appears on the big screen in ‘Steamboat Willy’.
1929 The first stock exchange crash with world-wide consequences.

1930 Betty Boop premiers in the animated film Dizzy Dishes.
1932 First Venice Film Festival.
1933 Leni Riefenstahl makes movies commissioned by German propaganda-minister Joseph Goebbels.
1934 Debut of Donald Duck in Bert Gillett’s animated short ‘The Wise Little Hen’.
1936 General Francisco Franco starts Spain’s civil war against the legal republic.
1938 Oil is discovered in Saudi Arabia.

1940 Germany invades Holland and Belgium.
1940 Charly Chaplin makes ‘The Great Dictator’, mocking the Nazis.
1943 16 Years old Swedish boy Ingvar Kamprad founds IKEA.
1945 Atom bombs on Hiroshima and Nagasaki end the Second World War.
1945 Foundation of the United Nations.
1947 Edwin Land first demonstrates the Polaroid instant camera.
1948 Mahatma Gandhi is murdered.

1950 Diners Club introduces a generally accessible credit card.
1951 The first commercial computer in America is the 15.000 kilo Univac.
1955 The first MacDonald's restaurant opens in Illinois.
1955 Disneyland opens in Anaheim, California.
1956 De NOS (Dutch Broadcasting Organization) starts NTS (Dutch Television Organization) with news broadcasts three times a week.
1957 John Lennon and Paul McCartney meet.
1959 Fidel Castro and Che Guevara take over Cuba.
1959 The Barbie doll is launched.

1961 Erection of the Berlin Wall.
1962 Nike is founded under the name of BRS (Blue Ribbon Sports).
1962 The first James Bond movie: 'Dr. No'.
1963 John F. Kennedy is murdered in Dallas.
1962 Andy Warhol paints Marilyn Monroe.
1965 Benetton is founded.
1967 Application for the American patent for the 'X-Y Position indicator for screen systems' (the computer mouse).
1967 The first advertisements are broadcast on Dutch TV.
1969 Woodstock festival.
1969 Neil Armstrong is the first man on the moon

1970 The 'wave' is introduced as Coca-Cola's new look for the 1970s.
1971 Philips introduces the first home-videorecorder.
1971 Ray Tomlinson sends the first email over a computer network, probably something like 'QWERTYUIOP'.
1974 US president Richard Nixon resigns after the Watergate scandal.
1975 Rembrandt's painting 'The Night Watch' is slashed a dozen times at the Rijksmuseum in Amsterdam.
1977 Dries van Agt, Minister of Justice in the Den Uyl administration, issues a law that limits the public screening of porn movies to Dutch theatres with less than 50 seats.
1978 Coca Cola comes to China, the only packaged cold drink allowed in the country.
1979 IBM introduces the personal computer.

1980 CNN is launched as the first all news network.
1980 Post-it notes are introduced nationally in the United States.
1981 MTV airs its first videoclip: The Buggles' 'Video killed the radio star'.
1982 Michael Jackson's 'Thriller' sells 20 million albums to become the largest selling record ever.
1982 Diet Coke is introduced.
1983 Compact discs are first released.
1983 The first commercially available mobile telephone: the Motorola DynaTAC 8000X.
1984 Apple introduces the Macintosh.

1985 Microsoft introduces Windows.
1986 A radio-active cloud spreads over Europe after the Tsjernobyl-disaster.
1988 Dutch television is expanded with a third broadcasting channel.
1988 Nike introduces the slogan 'just do it'.
1989 The Berlin Wall is dismantled.

1990 Nelson Mandela is freed after 28 years of imprisonment.
1990 The USSR ceases to exist, effectively ending the Cold War.
1991 Tim Berners-Lee develops the World Wide Web.
1991 Operation Desert Storm begins with air strikes against Iraq.
1992 The first commercial SMS is sent over the Vodafone GSM network.
1992 An Israeli plane crashes into a 12-story building in the Bijlmer, Amsterdam, killing 43 and injuring many more.

1993 The European Community is renamed European Union.
1993 The Late Show with David Letterman premieres on CBS.
1994 The first digital camera for the consumer market: the Apple QuickTake 100 camera.
1994 Opening of the tunnel under the English Channel.

1995 Disney makes a completely computer-generated animated movie: Toy Story.
1996 The first version of the Java programming language is released.
1997 The dvd is introduced.
1997 Princes Diana dies in a car crash in Paris.
1998 Paula Jones accuses U.S. President Bill Clinton of sexual harassment.
1998 Google is founded by students Larry Page en Sergey Brin.
1999 Rene van Mullem starts 'Marktplaats.nl'.
1999 Ad-agency KesselsKramer creates mobile phone company campaign 'Ik ben Ben'.

2000 The second Millennium fails to set off the Y2K-bug.
2000 The explosion of a fireworks factory in Enschede, the Netherlands, kills 23 and destroys a complete neighborhood.
2000 Hillary Rodham Clinton is elected to the United States Senate.

2001 The iPod is presented.
2001 Terrorist attacks on the World Trade Center in New York and the Pentagon in Washington.
2001 Wikipedia goes online.
2001 A new Dutch law allows same-sex couples to legally marry for the first time in the world since the reign of Roman emperor Nero.

2002 The Euro becomes Europe's official currency.
2002 Pim Fortuyn is murdered.
2002 The International Criminal Court is established in The Hague.
2002 Switzerland joins the United Nations.

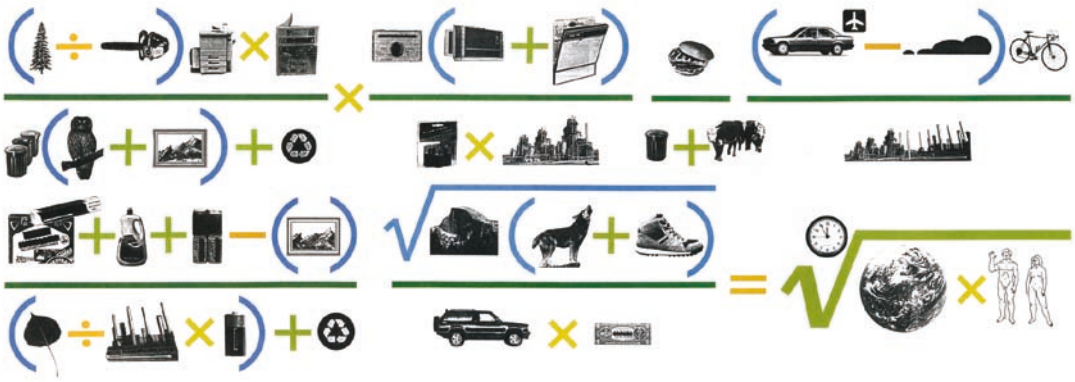
2003 Skype is introduced.
2003 Ben becomes T-Mobile Netherlands.
2003 The UK government recognizes British Sign Language as an official British language.
2003 Troops from United States, United Kingdom, Australia, and Poland invade Iraq.

2004 Theo van Gogh is murdered.
2004 Michael Moore publishes Fahrenheit 9/11.
2004 The European Union expands by 10 members.
2004 Following a 9.5 magnitude Earthquake, giant Tsunamis kill approximately 200.000 people in a dozen of countries around the Indian Ocean.

2005 Talpa starts broadcasting.
2005 The first prototype of Airbus A380 is tested with 555 passengers on board.
2005 In national referendums, the French and the Dutch vote against the new European Constitution.
2006 TPG Post is renamed TNT Post.
2006 Al Gore publishes 'An inconvenient truth'.
2006 The 1 billionth song is purchased from the Apple iTunes Store.
2006 Al Jazeera launches its English language news channel.

2007 Gorilla Bokito escapes from his burrow in Blijdorp Zoo, seriously injuring a female visitor.
2007 HEMA is sold to the British investors Lion Capital.
2007 Live Earth Concerts are held throughout 9 major cities around the world.
2007 Two television news helicopters collide in midair while covering a police chase in Phoenix, Arizona.
2007 Talpa stops broadcasting.

from infographics to visual dialects



Renewal Equation,
Katherine McCoy, 1991

From infographics to visual dialects

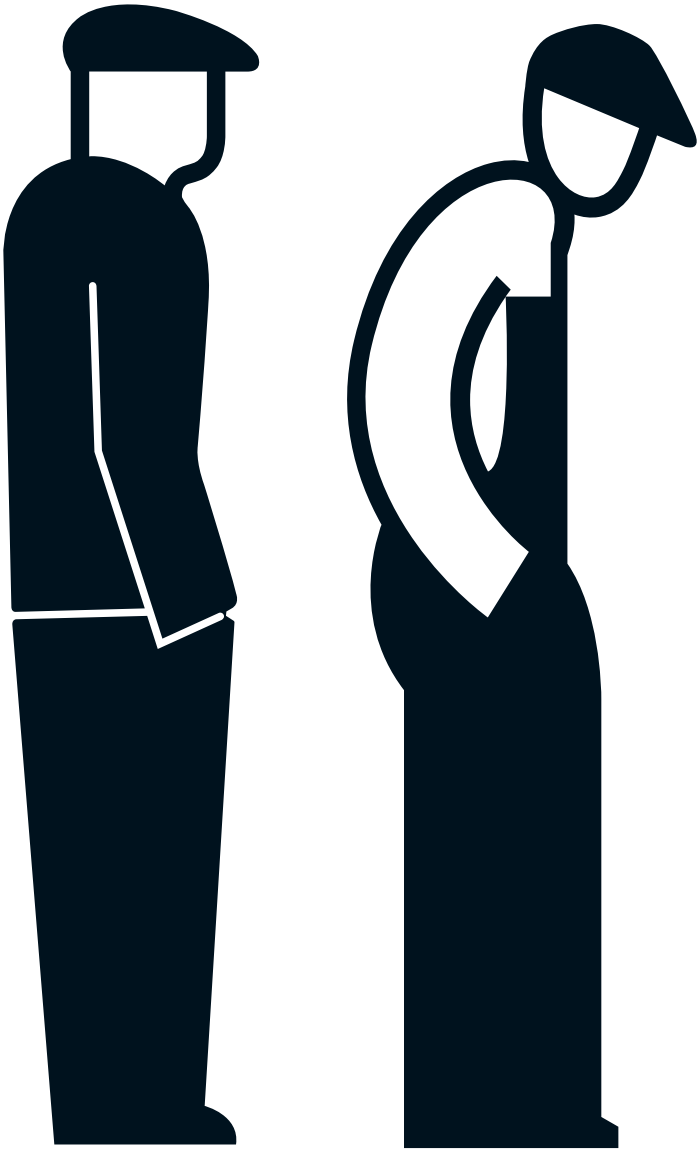
In 1991, Katherine McCoy wrote a small visual essay about the complex relations between consumption, the environment and the need for renewable resources and human action in order to save the world from pollution. Not a single word or number was used in this graph which mimicked the form of a mathematical formula. Still, the idea that nature and the things we make out of it are in a precarious balance and that everything in this equation is affecting its outcome, communicates in a crystal-clear fashion. It should be noted that one reads such

a ‘visual text’ in a different way than a verbal one. If you would try to literally ‘solve’ the math in this image by figuring out how the various variables relate within the structure of the equation, you would end up completely puzzled. This may well be a secret aim of the designer, but it is not the main point of the image. What transpires from this image and the arrangement of the pictorial elements is that the situation is complex, not how exactly it is complex. Visual semiotics work different than verbal semantics – one reads these pictures by association, not by their logical argumentation.

The same holds true for the most straightforward infographics, a genre of

information design that directly stems from Neurath's and Arntz's Isotype system. In such graphics, the pictorial signs themselves contain little objective information – they symbolize categories, and their meaning resides in their size and number.

Their form, however, is subjective, as is apparent when one compares for instance Arntz's and Modley's versions of the symbol for 'unemployed'. Although structurally quite similar, the two signs express rather different emotional conditions. The capped head of Arntz's unemployed worker looks slightly bent, but actually isn't: the artist moved it a bit forward, so it looks as if the man has



Left: Gerd Arntz, 1920s
Right: Rudolf Modley, 1930s

lowered his head between his shoulders – a sign of passive acceptance. But his back is straight, and with his hands in his pockets, the man's air of passivity becomes almost defiant. He's idle, but not crushed. Modley's unemployed, on the other hand, clearly has his head bent, as in submission to his fate. This emotional expression is reinforced by the bend in his arm, which suggests a crooked back. This worker is not only idle, he is devastated, and we see why in the small illustration at the top of Modley's graph: the man cannot provide for his family anymore (see p.146). One could say that both pictograms represent two words for the same thing, stressing slightly different aspects of it.

Just like the words ‘idle’ and ‘inactive’ are synonyms, but not completely the same. Another way of describing the difference between Arnzt’s and Modley’s pictograms is as dialects or vernacular: the words are fundamentally the same, but written and pronounced differently, whereby one dialect clearly has a more dramatic ring than the other.

In reading the visual language of infographics, the emotional associations we have when looking at pictures play a significant role in interpreting the information. In Adriana Lins de Albuquerque’s graph of the death toll of the war in Iraq, for instance, the exact numbers in the statistics are, although

readable, not the first information we digest; what we see is a vast graveyard (p.148-149). In other words, the fact that we cannot read the exact amount of deaths at first glance is probably the most important information this graph communicates: too many dead people. And the choice in this graph for a woman holding a baby to symbolize 'civilians' is of course a strong example of visual rhetorics. Far from being a neutral sign, it is a symbol that is meant to provoke an emotional response.

More and more, it becomes clear that the visual language of pictograms and icons is not as objective as its inventors envisioned it to be. It is a sign that this

visual language is a language indeed: it has its dialects and vernaculars, and one can say things in it that are neither completely true nor completely false. But like any other language, this one too needs a literate audience to be fully understood.

Take Katsuichi Ito's humorous variations of Chinese characters, in which he has visualized the meaning of a number of words in a pictographic manner, by slightly altering the character itself. Even those who cannot read Chinese will recognize the meaning of some of the characters, for instance 'umbrella', or 'music'. But if you don't know the character 'blood', you may miss the



Object	当
Target	的
Gift	贈
Music	曲
Umbrella	傘
Volume	巻
What	何
Blood	血
Wager	賭
Bad Luck	凶
Nail	針
Hit	打

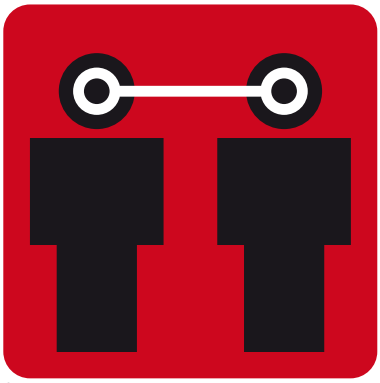
The image of Chinese Characters,
Katsuichi Ito, 1972

visual pun in Ito's version of it and perhaps take the bleeding character for a leaking one. Ito symbolizes the meaning of the whole character by altering a part of it so it becomes an illustration of the thing the word refers to. In this case, there is the additional association with the historical root of Japanese and Chinese characters – they have started out as pictograms. Such intricate combinations of verbal and pictorial language show what words and pictures have in common, and how they differ. We read pictures by association, and our associations can be biased by combining the pictures with words – or the other way around. The words focus the pictures, the

pictures open up an associative field around the words.

When words are absent, one needs to rigidly organize the visual rhetorics of an image to warrant its legibility and unambiguousness. Max Kisman's pictographic illustrations for a Dutch telecom company show how to do that.

They completely rely on standard ways of visually expressing how people communicate with each other. We look at each other, exchange thoughts and have conversations. And the pictogram in which the symbol of a light bulb connects two heads is easily readable as 'having an idea together'.



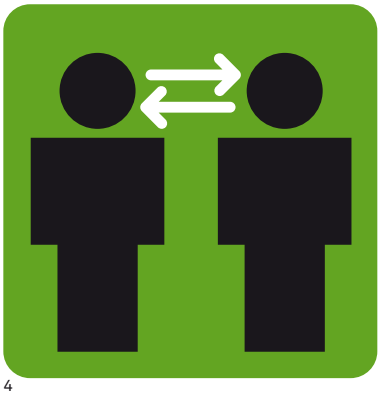
1



2



3



4

Four pictograms for website KPN Research, Max Kisman, 2001
1 Expertise groups
2 Support
3 Innovation
4 Consultancy



Max Bruinsma added two dots and a line to Kisman's original pictogram, dramatically changing it's meaning: innovation becomes death.

It is a visual metaphor that comes from early comic strips – think of the weird inventor Gyro Gearloose in Walt Disney's Donald Duck –, which has become a globally recognizable icon. Based on this universal recognisability, one can abstract the image to its simplest form, as Kisman does. On this level, one needs only the slightest change of detail to completely change the meaning of the sign, just as adding a simple horizontal bar to an 'I' changes it into an 'L'. If one would add two dots and a line to Kisman's abstracted lamp, the two figures would be discussing death instead of having a bright idea.

Such play with writing and varying pictographic scripts has become natural for many in the industrialized and mediatised world, regardless of culture or geography. Already in 1953, Marshall McLuhan, the theorist and advocate of new media and how these change the way 'technological man' experiences the world, stated that "the language of visual form" will become the natural "Esperanto at everybody's command." Like Neurath before him, McLuhan saw that the exchange of and through images surpasses language and cultural borders. McLuhan points to the fact that every scientist of the world can read and write in "pictograms of scientific formula and logistics," and concludes: "These

ideograms transcend national barriers as easily as Chaplin or Disney and would seem to have no rivals as the cultural base for cosmic man."[1]

McLuhan's summary is that "technological man must betake himself to visual metaphor in contriving a new unified language for the multiverse of cultures of the entire globe." This may be a bit old-fashioned English, but it echoes Neurath's analysis of 'picture language' as a universal communication tool, a thought that is exemplified by McCoy's 'equation' mentioned earlier, in which she uses the "pictograms of scientific formula". But to this McLuhan adds the idea that with the spread of

[1] Marshall McLuhan: Culture Without Literacy, in: Explorations: Studies in Culture and Communications, no. 1, December 1953, 117-27

visual communication through globe-spanning media, the world also becomes less unified: a multiverse of cultures, constantly talking to each other.
Are the vernaculars of this 'multiversal' visual language still meant to make us understand each other? Where it concerns the communication of neutral or unambiguous information, like in way-finding and signage, I think with Neurath and McLuhan that there are few better ways of reaching a global audience regardless of culture and language, than by means of visual language.

But one could say that this aspect of visual language, the basic symbols and pictograms that are designed to

be universally understood, is only one side of the language; it represents the 'official' language of pictorial symbols. Beyond this 'lingua franca' of signs, there have grown many vernaculars, which as local dialects address not the world at large, but a neighborhood of like minds.

Max Bruinsma, December 2007


严防潮湿
KEEP DRY

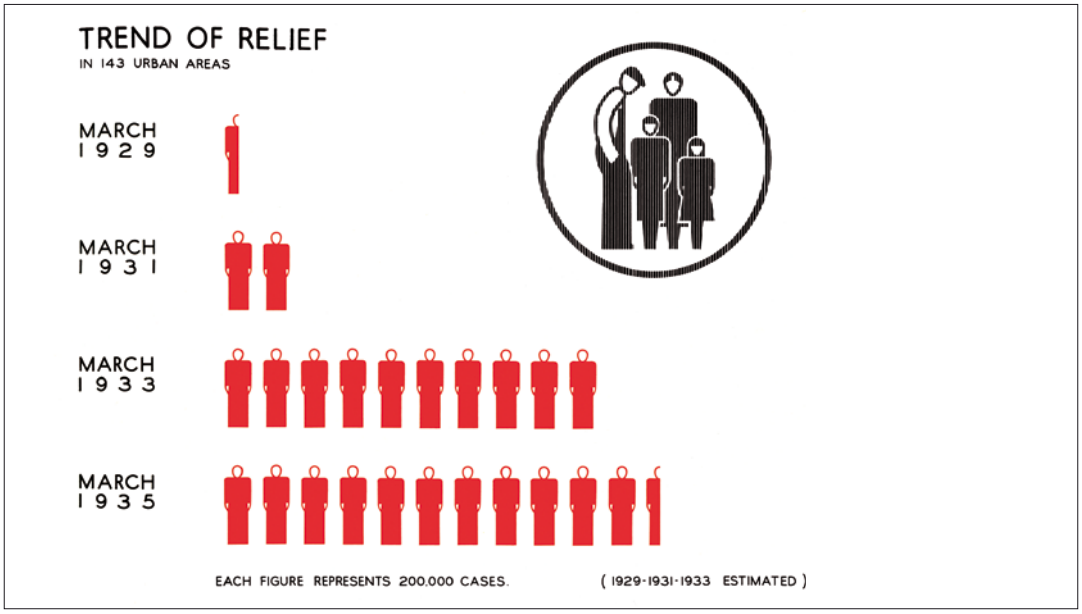
Infographics

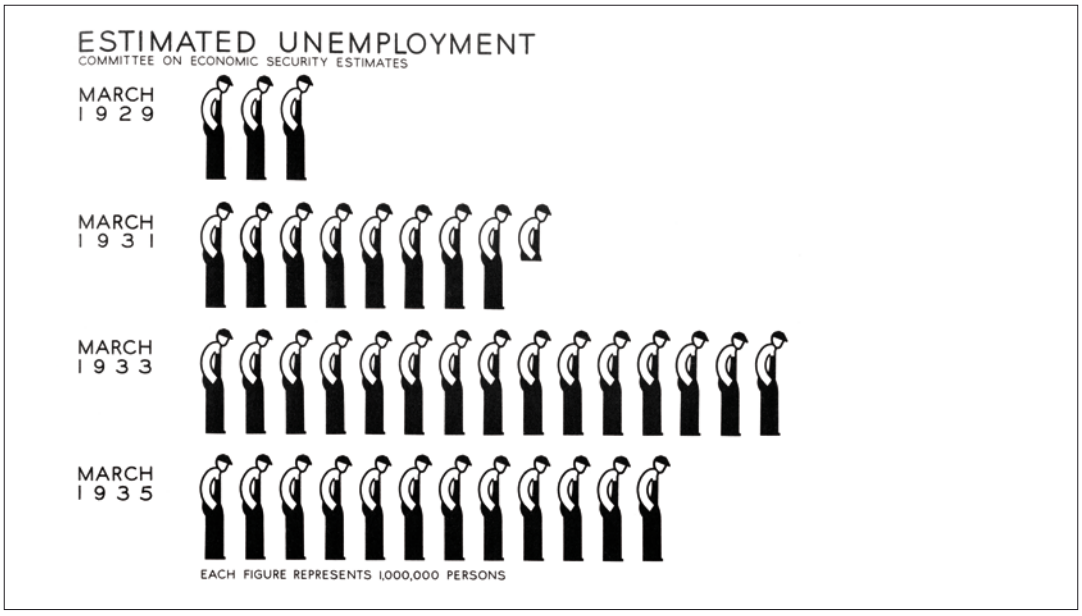
More and more, information is being summarized in images. Not primarily to keep those informed who have a difficulty with reading, as pioneers Neurath and Arntz envisioned, but nowadays mainly because infographics can reveal the gist of a message at a glance. For this reason, for instance, newspapers often use them to summarize the essence of a news item. But the function of such infographics is not only to inform, but also to entertain and to grab the attention. Sometimes, the graphic turns into a vivid depiction of the drama, for instance of the Amsterdam Bijlmer plane crash (see p.172-173), without caring too much about the factual details of the event.

Another use of infographics is in visual explanations in manuals and construction schemes. Here, the 'exploded view' is a classic. In such graphs, all the parts of a machine or product are shown as single items in relation to their position within the complete structure. Isotypical of such graphics is that the parts and the whole can be seen in one view.

The schemes and diagrams of visual statistics and infographics follow a particular grammar, which guarantees easy legibility of objective information. Relative scale, perspective, the order of events or steps in a process, the recognizability of abstracted objects and symbols for functions - all of this requires thorough organization by a professional hand, in order to convey the correct information.

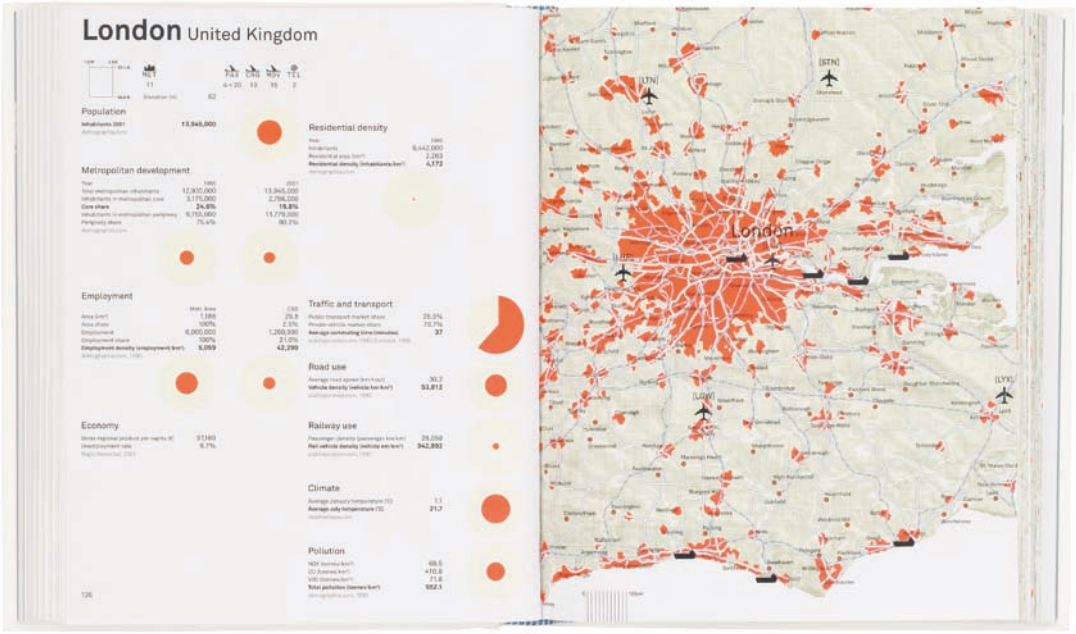
But today this visual language of objective data is also used to formulate subjective messages. Statistics, after all, remain a matter of perspective. And the choice of data which are compared and contrasted is as important for the message they communicate as is their representation.

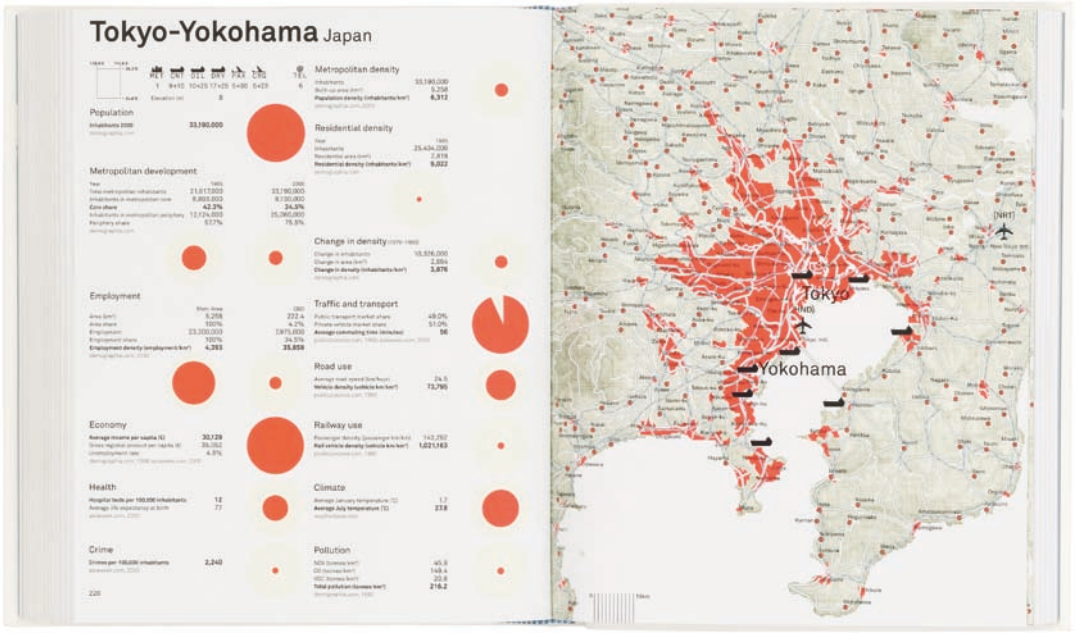




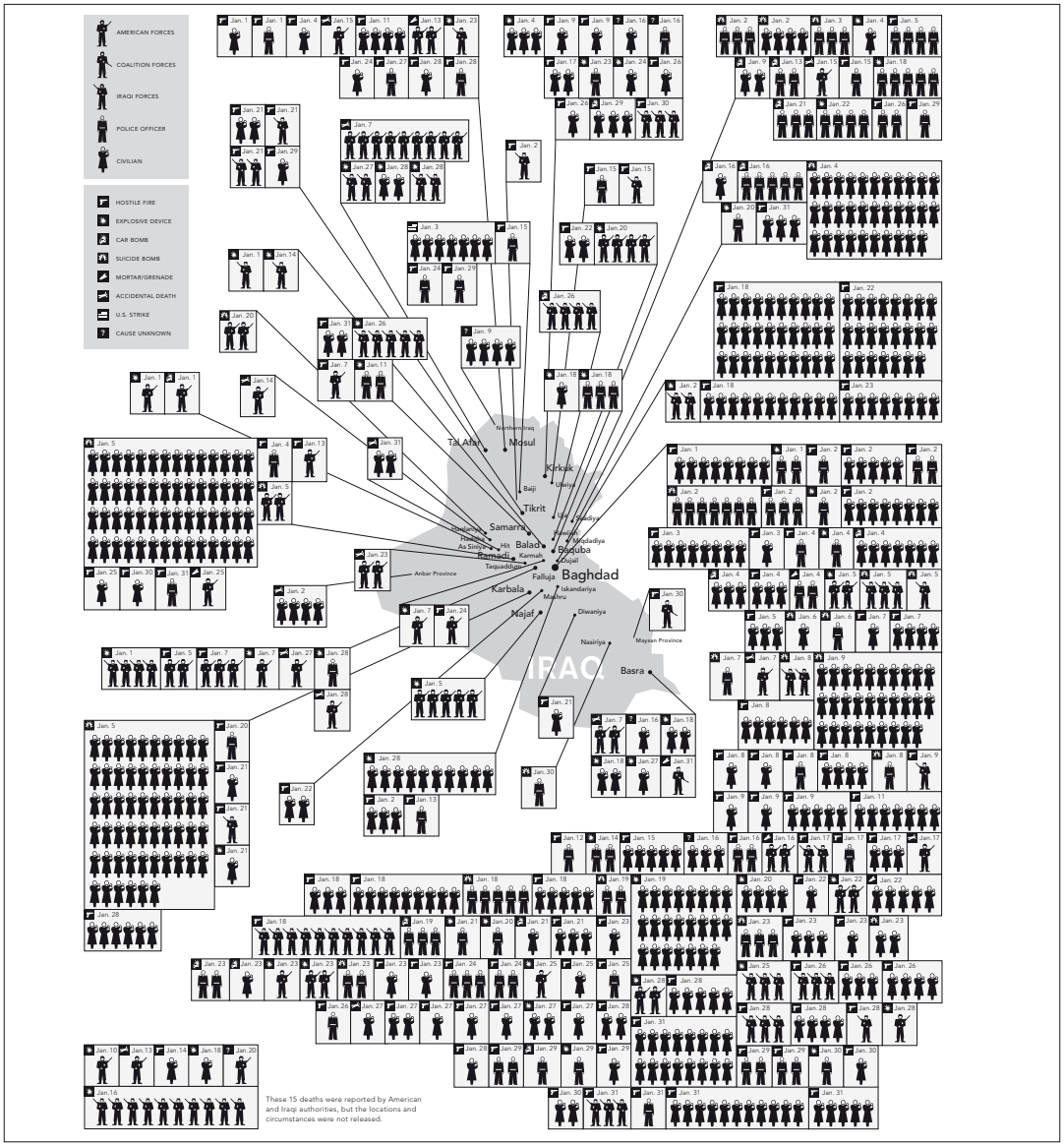
On Relief, General relief program *Rudolf Modley (design director)* 1935

The American Rudolf Modley was an intern at Otto Neurath's in Vienna in the early 1930s, and later introduced isotype in the U.S.. Like Neurath, Modley employed various artists. They worked in the style of Gerd Arntz, but in a more expressive vein than their European predecessor. In this infographic on American unemployment and social relief, for instance, the aproned worker's back is more crooked than that of Arntz's figure.



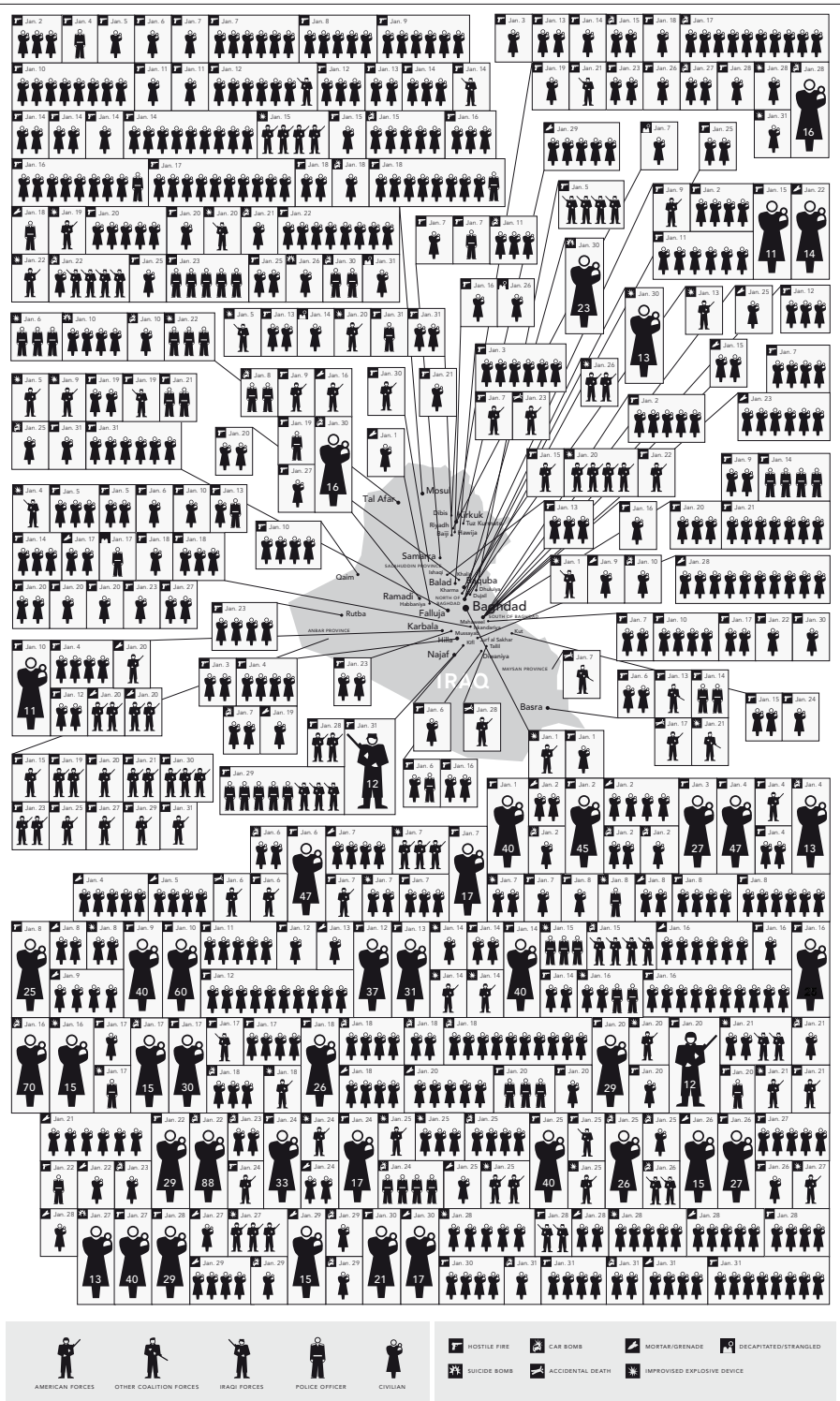


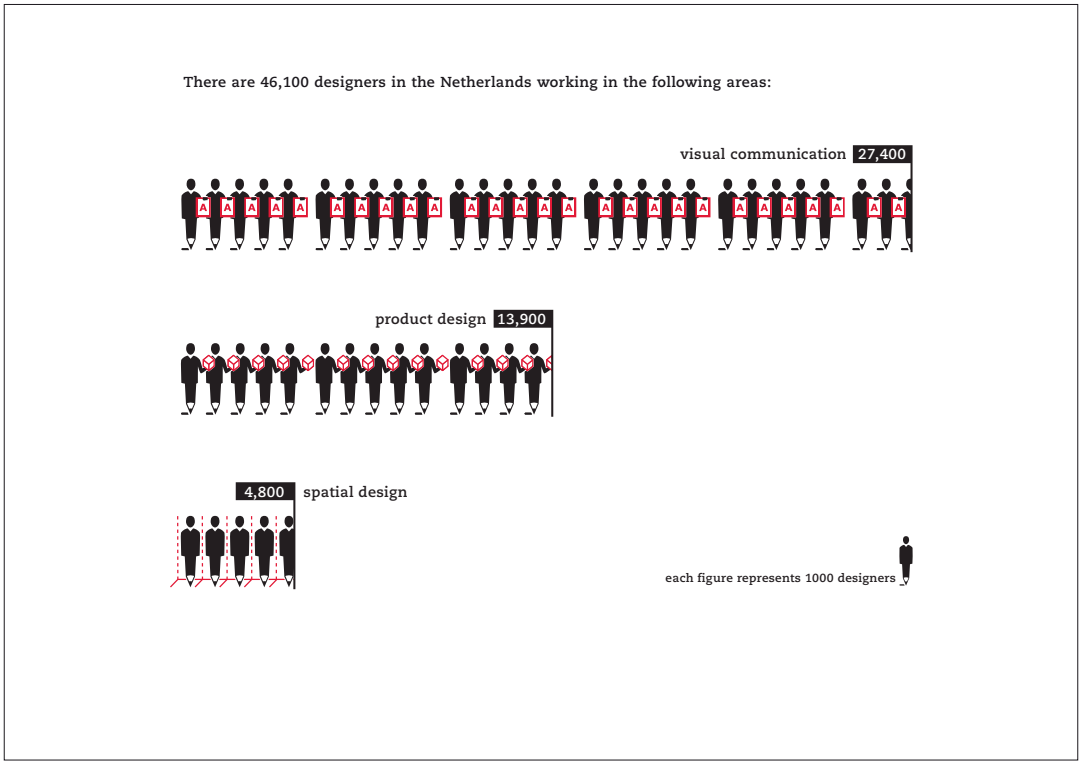
Metropolitan World Atlas *Arjen van Susteren, Joost Grootens (graphic design)* 2005
Remarkable in this atlas of 101 big cities in the world is that they are all rendered at the same scale. This makes them comparable at a glance. With such data as population density, income and amount of cars per city conveniently arranged as circle diagrams, these maps are a contemporary interpretation of isotype.



31 Days in Iraq *Adriana Lins de Albuquerque, Alicia Cheng (graphic design)* 2006 and 2007

A more or less isotypical way of visualizing the carnage that takes place in Iraq. The somewhat cluttered lay-out prioritizes dramatic effect over clarity of content.
The infographic gives an overview of 'one month in Iraq': the numbers of dead, specified according to military and civilian casualties and related to the place and date of the incident. The New York Times, which published the infographic, wrote: 'It is our effort to see the isolated reports in a broader context and visually depict the continuing human cost of the Iraq war.'

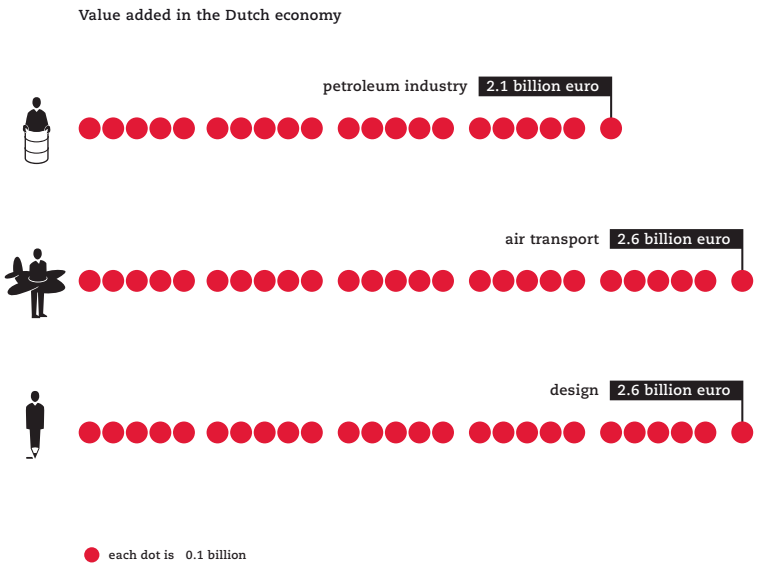

IRAQ
Mosul
Tal Afar
Kirkuk
Sulaymaniyah
Baqubah
Baghdad
Samarra
Balad
Ramadi
Falluja
Qaim
Rutba
Karbala
Najaf
Basra
Hilla
Kut
Diwaniya
AMERICAN FORCES
OTHER COALITION FORCES
IRAQI FORCES
POLICE OFFICER
CIVILIAN
HOSTILE FIRE
CAR BOMB
MORTAR/GRENADE
DECAPITATED/STRANGLED
SUICIDE BOMB
ACCIDENTAL DEATH
IMPROVISED EXPLOSIVE DEVICE



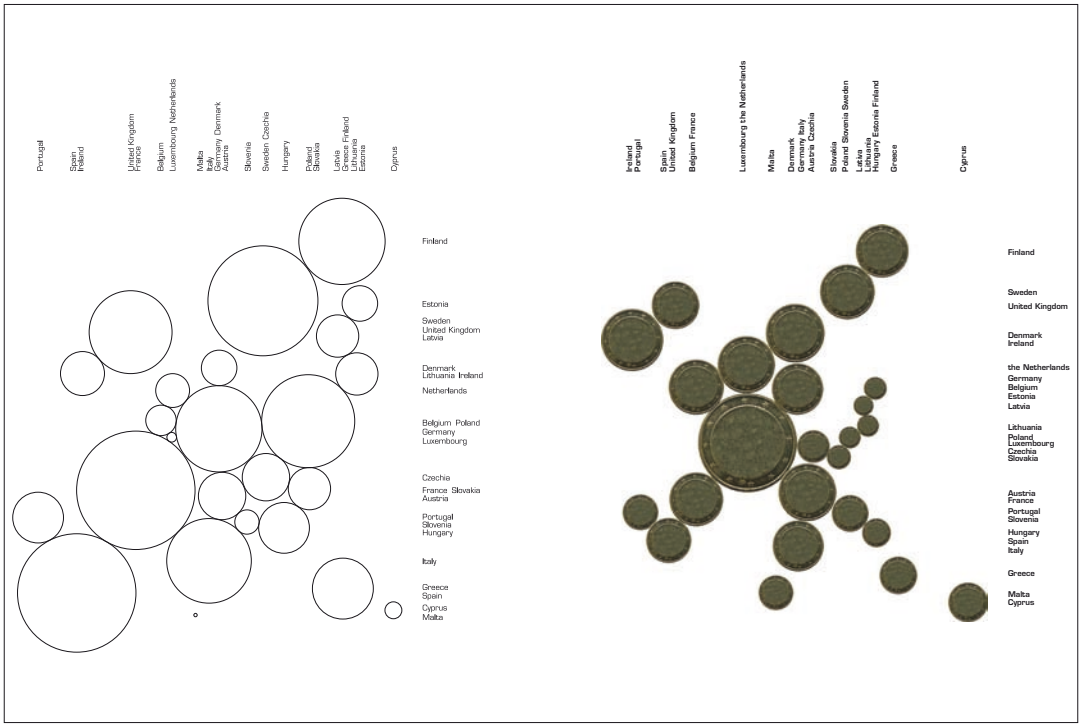
Design in the creative economy

Premsela Dutch design foundation, Bureau Mijksenaar (graphic design) 2005

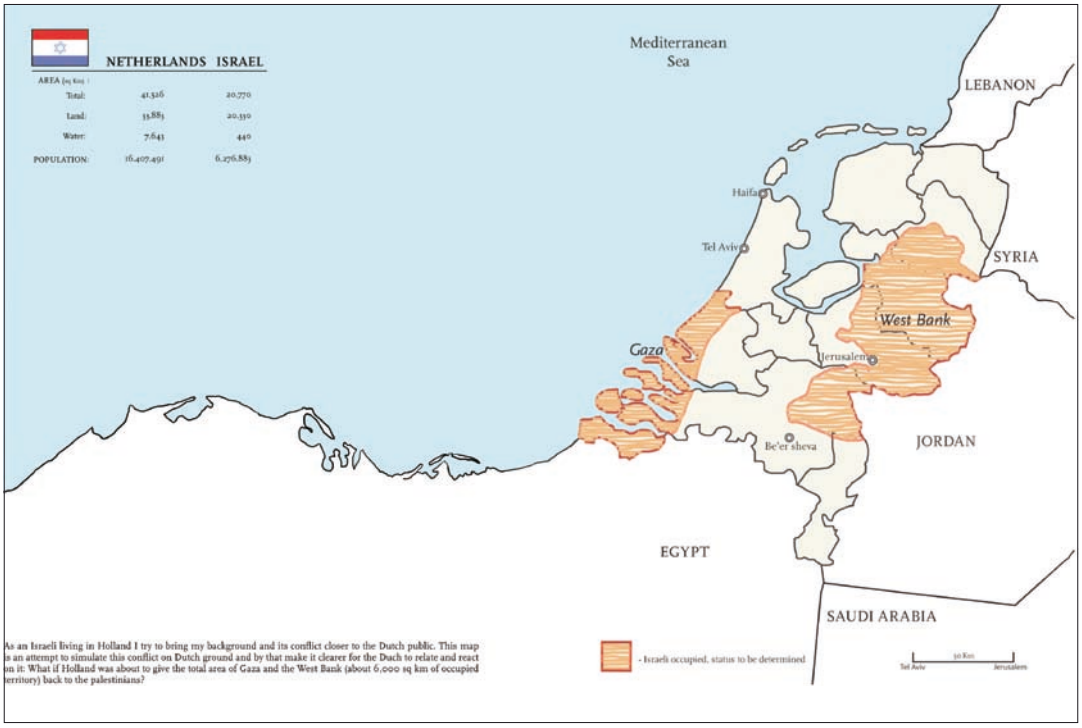
In this statistical overview of design's contribution to the Dutch economy, Mijksenaar emulates Neurath's and Arntz's method and clarity. As with his predecessors, here also recognizability prevails over realism where it concerns the form of the symbols: although most designers today work with computers, they are here still depicted by their archetypal instrument, the pencil.



Design is on a par with the petroleum industry (excluding mineral extraction) and the air transport industry. In 2001, these two industries realised a total value added of € 2.1 billion and € 2.6 billion respectively.



EU Standards *Kadri-Mitt, Margo Niit, Rain Saavel, Anu Vahtra (design). From: Annelys de Vet (ed.), 'Subjective atlas of the European Union from an Estonian point of view', Estonia* 2004
Two rather different views of Europe, using the same infographical method: the geographically arranged circles on the left represent the populations of the European Union's countries. The general shape of Europe is recognizable. The circles on the right represent national income per inhabitant. All of a sudden, Luxembourg becomes the EU's largest country, and the UK is smaller than Ireland. A fine example of perception management in infographics.



'What if?' *Itay Lahav (design). From: Annelys de Vet (ed.), 'Subjectieve Atlas van Nederland', with students of the Design Academy, Eindhoven, Netherlands* 2005

Israeli design student Itay Lahav projects the map of his divided homeland onto that of the Netherlands. Mapping as cultural commentary: the comparison enables the Dutch reader to get a dramatic perspective on the small geographical scale of the Israeli-Palestine conflict. 'Imagine, what if...' is what Lahav says to his Dutch friends.

Bevolking

Den Haag in cijfers
DSO

Blz 10

Huishoudens naar type	1998	1999	2000	2001	2002	2003
eenpersoonshuishouden	107508	107076	108214	109032	110446	111473
samenwonend zonder kinderen	58446	57728	56981	56491	57301	57596
samenwonend met kinderen	42735	42582	42688	42680	45714	46677
eenoudergezinnen	17570	17794	17996	18479	18942	19516
Totaal aantal huishoudens	226259	225180	25879	226682	232403	235262

Bron: huishoudensraming
DSO/Beleid/Onderzoek

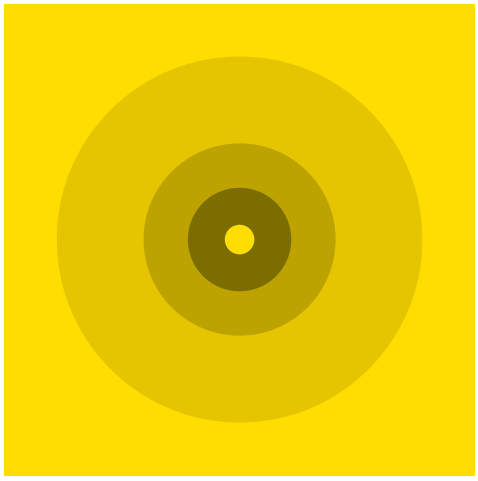


fig. DSO.05 / Huishoudens naar type, 2003

Bevolking

Den Haag in cijfers
DSO

Blz 11

Prognose 2004	2005	2010	2015
0 t/m 4 jaar	30400	30600	30200
5 t/m 14 jaar	52800	55400	56800
15 t/m 19 jaar	26700	27800	28000
20 t/m 44 jaar	192900	199800	197600
45 t/m 64 jaar	109400	120200	125900
65 t/m 79 jaar	43300	43500	49100
80 jaar of ouder	20900	18700	16800
Totaal	476400	496000	504000

Bron: DSO/Beleid/Onderzoek

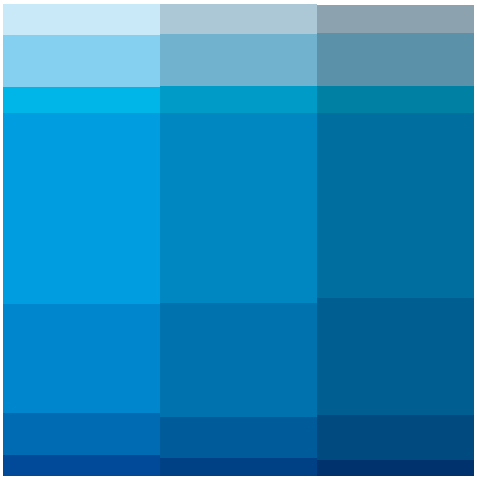


fig. DSO.06 / Bevolkingsprognose

Annual report the city of The Hague *Toko (graphic design)* 2004

Statistics and diagrams are necessary in annual reports, but visually often also rather dull. To give their 2004 annual report more prestige, the City of The Hague asked design studio Toko for an 'artistic approach'. Toko took this invitation literally and executed the statistics as silk-screened abstract geometric artworks.

Economie

Den Haag in cijfers
DSO

Blz 20

Aantal werkzame personen en aantal vestigingen naar sector, 2003	werkzame personen*	vestigingen
landbouw, jacht, bosbouw	863	217
visserij	349	6
industrie	8124	612
nutsbedrijven	809	7
bouwnijverheid	6051	940
handel en reparatie	23393	4772
horeca	6636	1648
vervoer/opslag/communicatie	17667	523
financiele instellingen	11223	494
zakelijke dienstverlening	36086	3597

Aantal werkzame personen en aantal vestigingen naar sector, 2003	werkzame personen*	vestigingen
openbaar bestuur/overheid	48968	262
onderwijs	11326	478
gezondheids-/welzijnszorg	29660	1577
overige diensten	13053	1887
extra-territoriale lichamen	451	141
totaal aantal	214659	17161

* een werkzame persoon heeft betaald werk van 12 uur per week of meer
Bron: DSO, L&V

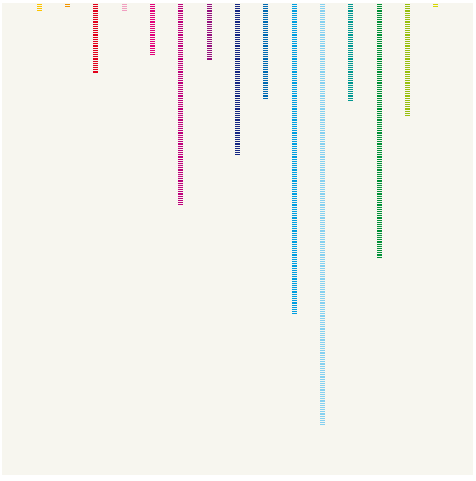


fig. DSO.15 / Aantal werkzame personen naar sector, 2003

Wonen

Den Haag in cijfers
DSO

Blz 14

Gemiddelde woningbezetting	aantal personen per woning
1980	2,46
1983	2,37
1986	2,29
1989	2,24
1992	2,21
1995	2,14
1998	2,11
2001	2,05
2003	2,05

Bron: CBS/DSO

Woningen naar bruto vloeroppervlak, 2003	aantal
bvo < 50 m²	8088
bvo 50-59 m²	13113
bvo 60-69 m²	26714
bvo 70-79 m²	35414
bvo 80-89 m²	34428
bvo 90-99 m²	23557
bvo 100-139 m²	49983
bvo 140-179 m²	16888
bvo > 179 m²	14250

Bron: OZB

Woningen naar bouwperiode, 2003	%
vóór 1945	45,1
1945 t/m 1970	23,7
1971 t/m 1990	15,9
1991 of later	15,3

Bron: OZB

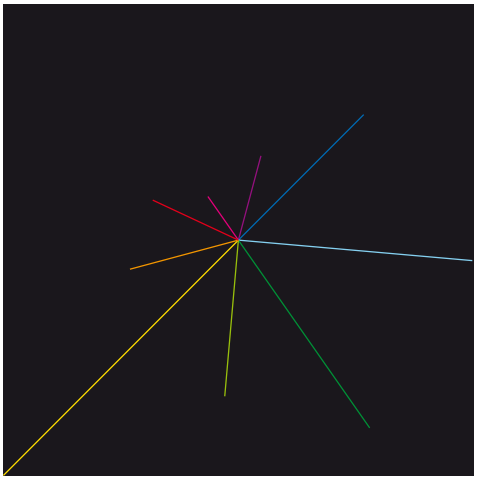
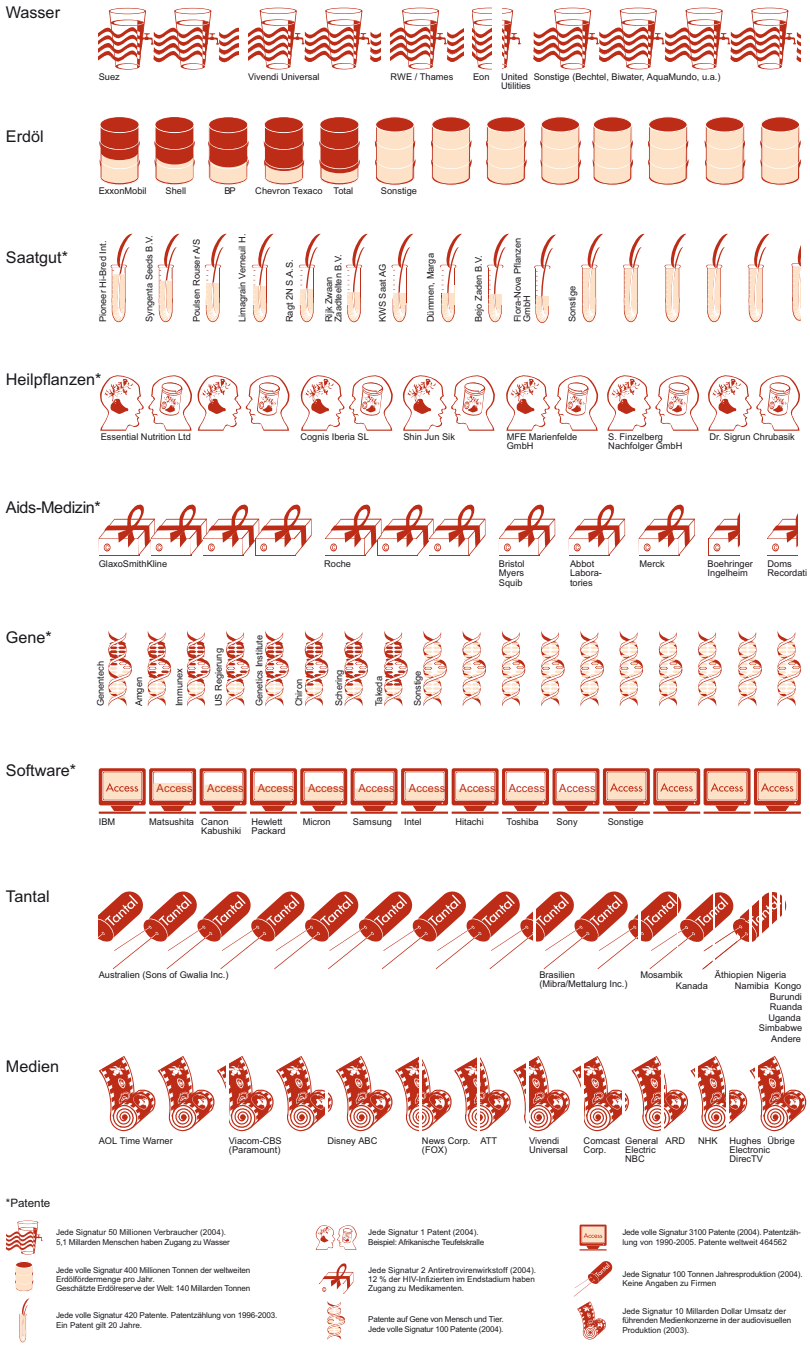


fig. DSO.09 / Woningen naar bruto vloeroppervlak, 2003

Monopolartige Produktionen



*Patente

Jede Signatur 50 Millionen Verbraucher (2004).
5,1 Milliarden Menschen haben Zugang zu Wasser

Jede volle Signatur 400 Millionen Tonnen der weltweiten Erdölfördermenge pro Jahr.
Geschätzte Erdölreserve der Welt: 140 Milliarden Tonnen

Jede volle Signatur 420 Patente. Patentzählung von 1996-2003.
Ein Patent gilt 20 Jahre.

Jede Signatur 1 Patent (2004).
Beispiel: Afrikanische Teufelskralle

Jede Signatur 2 Antiretrovirenwirkstoff (2004).
12 % der HIV-Infizierten im Endstadium haben Zugang zu Medikamenten.

Patente auf Gene von Mensch und Tier.
Jede volle Signatur 100 Patente (2004).

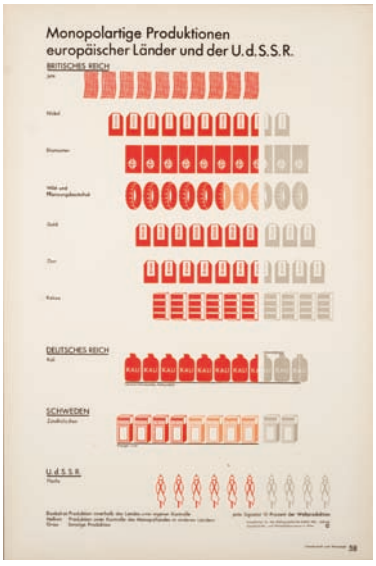
Jede volle Signatur 3100 Patente (2004). Patentzählung von 1990-2005. Patente weltweit 464562

Jede Signatur 100 Tonnen Jahresproduktion (2004).
Keine Angaben zu Firmen

Jede Signatur 10 Millarden Dollar Umsatz der führenden Medienkonzerne in der audiovisuellen Produktion (2003).

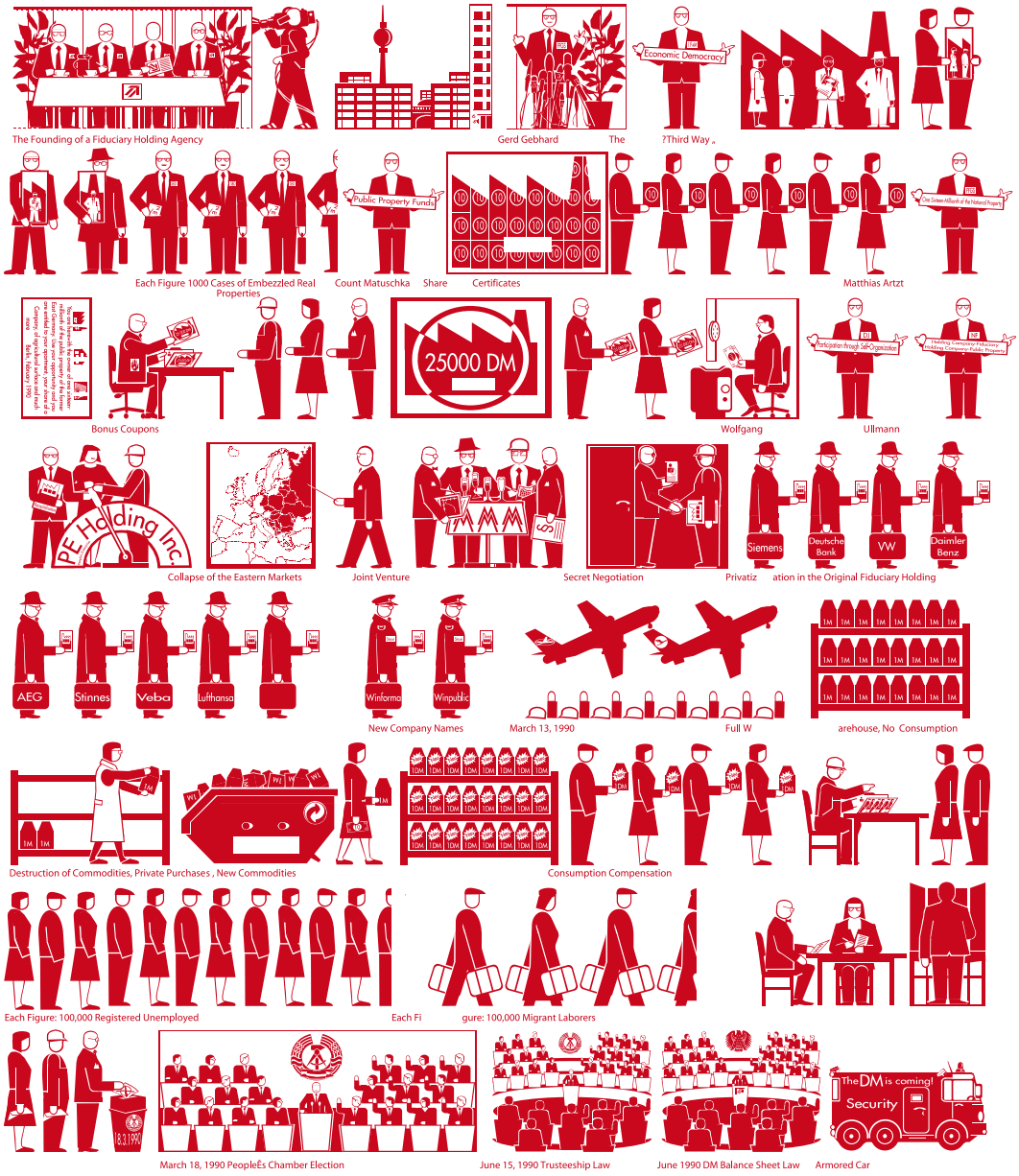
Monopolartige Produktionen *Alice Creischer, Andreas Siekmann* 2005

Creischer and Siekmann updated an Isotype chart from Neurath's and Arntz's 1930 Atlas (below): who are governing the world markets now? Who owns the most patents on genes? Who has the most software copyrights? Despite the similarity with Neurath's and Arntz' charts, this infographic is weak in terms of easy comparison of data and relative amounts. Rather, it gives a strong image of the growing entanglement between scientific research, access to base materials and business.



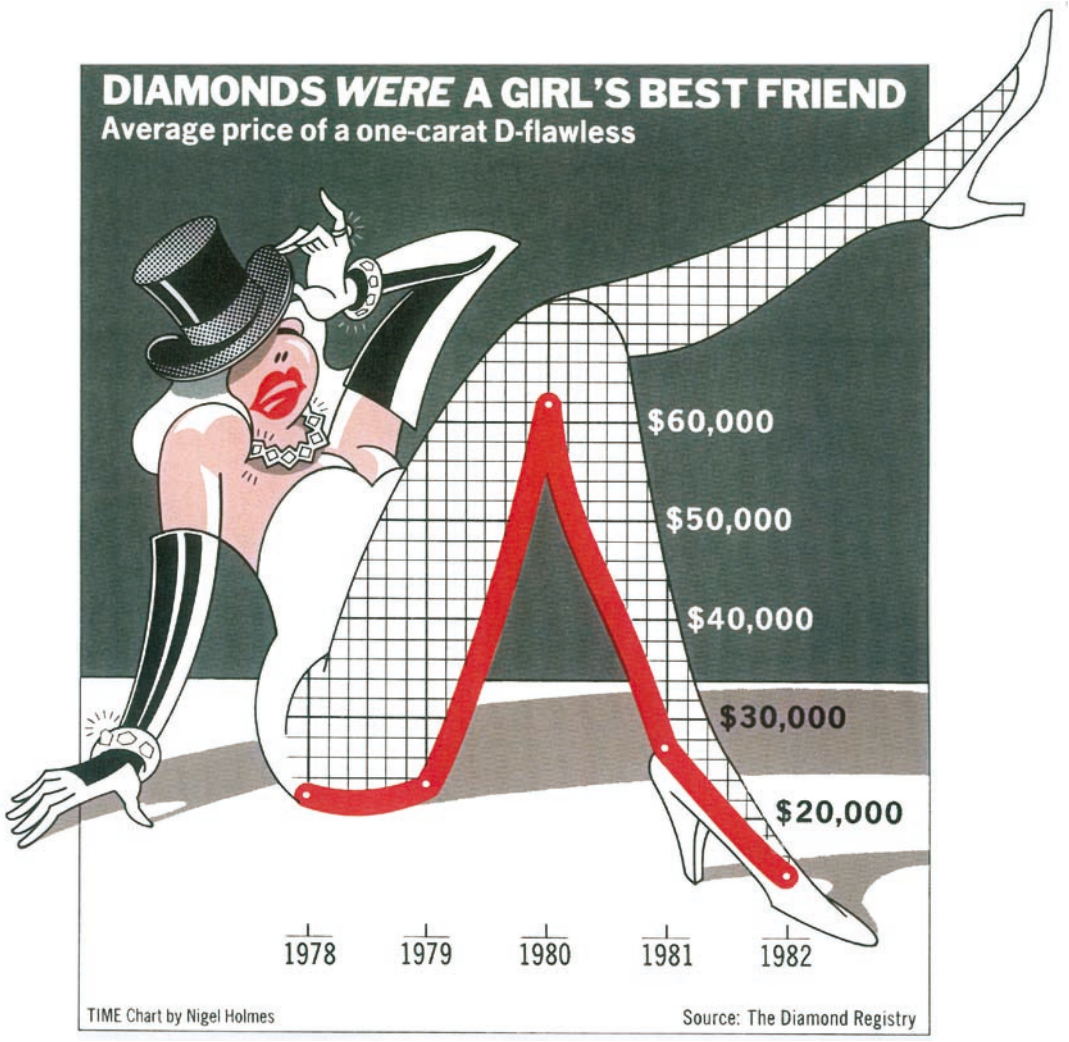
Monopoly-like production in European countries and the USSR (Page 58 from Gesellschaft und Wirtschaft) *Otto Neurath* 1930

Monopolies are the cornerstones of imperialistic capitalism, and insight in the countries that control the world production of raw materials is, in the eyes of socialists Neurath and Arntz, essential for class struggle.



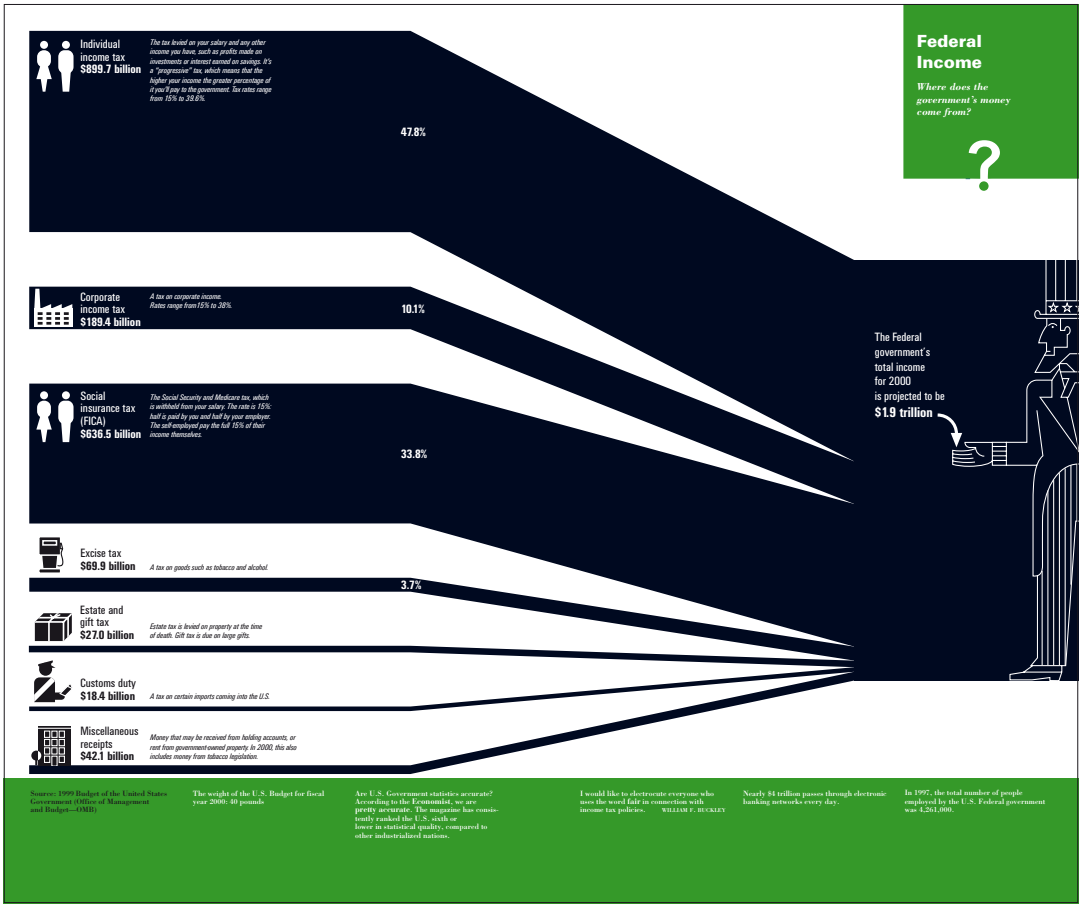
Pawns, trustees, and the invisible Hand *Andreas Siekmann* 2005

Artist Siekmann uses infographics to express his critical stance towards politics and economy. Although he uses the aesthetics of Isotype, in his account of the economical and political events leading up to the unification of East- and West Germany and the conversion of the GDR Mark to the Deutschmark, he provides an illustrated narrative rather than an objective visual statistic. For those who are not intimately familiar with the flow of events of 1990, the charts are incomprehensible without referring to the extended texts that accompany them.

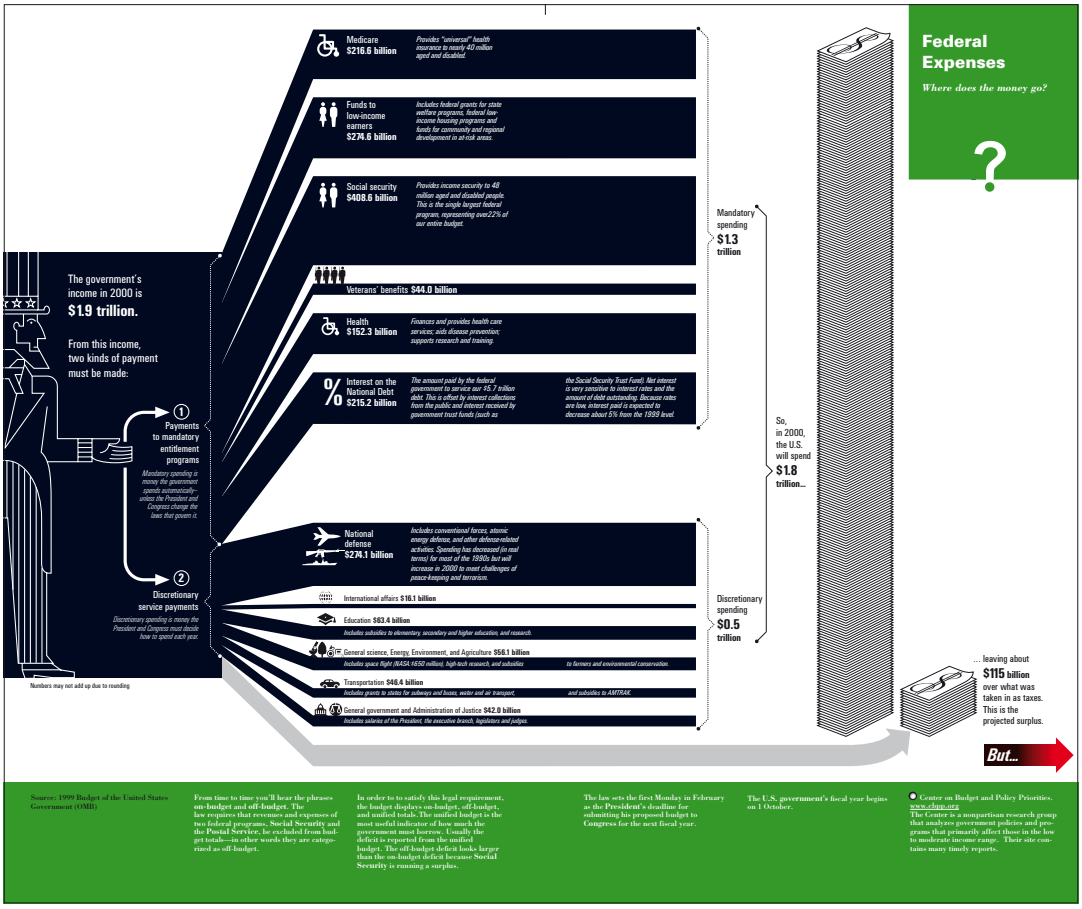


Diamonds *were* a girl's best friend *Nigel Holmes* 1982

The American graphic designer Nigel Holmes was inspired by Neurath's ideas about visual statistics and Arntz's abstracted imagery, but his interpretation of these ideas was considerably less modernist and austere. Of course a visual statistic should be clear, correct, consistent and attractive, but Holmes places much more emphasis on the entertainment value of infographics. Thereby he has exerted a huge influence on newspaper design. In this infographic for Time Magazine, Holmes gives a comic twist to a serious graph of diamond prices, using a checkered graph paper as texture for the girl's fishnet stockings.



Federal income and federal expenses (from: Understanding USA) *Nigel Holmes* 1999
Just like Neurath did for Europe and the world in his 1930 'Atlas', the basic social and economic data of the United States are explained by visual means in Richard Saul Wurman's book Understanding USA. In this infographic the thickness of the lines represents the percentual contribution of various social sectors to Uncle Sam's federal income. The pictograms illustrate the different sectors, but not, as usually in isotype, their share.



Source: 1999 Budget of the United States Government (OMB)

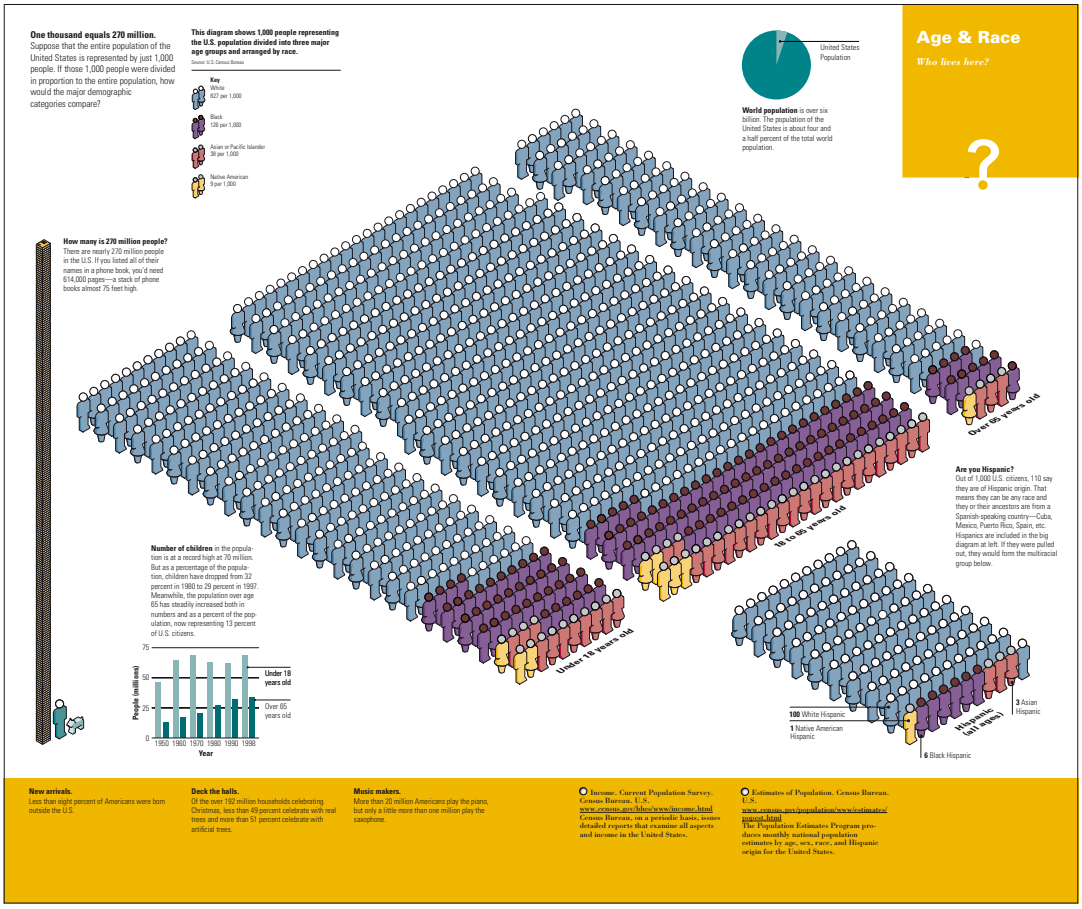
From time to time you'll hear the phrases **on-budget** and **off-budget**. The law requires that revenues and expenses of two federal programs, **Social Security** and the **Postal Service**, be excluded from budget totals—in other words they are categorized as off-budget.

In order to to satisfy this legal requirement, the budget displays on-budget, off-budget, and unified totals. The unified budget is the most useful indicator of how much the government must borrow. Usually the deficit is reported from the unified budget. The off-budget deficit looks larger than the on-budget deficit because Social Security is running a surplus.

The law sets the first Monday in February as the President's deadline for submitting his proposed budget to Congress for the next fiscal year.

The U.S. government's fiscal year begins on 1 October.

● Center on Budget and Policy Priorities. www.cbpp.org
The Center is a nonpartisan research group that analyzes government policies and programs that primarily affect those in the low to moderate income range. Their site contains many timely reports.



Demographic snapshots - Becoming President (from: Understanding USA)

Reed Agnew, Don Moyer 1999

How to become president of the United States? In this infographic from Understanding USA, this is summarized in classic isotypical manner, in a way that at the same time provides an overview and contains a wealth of details for the attentive reader of images. Note, for instance, the mud-throwing between steps 20 and 21, the distribution of white and black, and the only woman appearing in this image (step 16).

Becoming President

How do you get to the White House?

One step at a time.
Reaching the White House is a long trip. It may take years. Basically, you've got to convince millions of voters that you know how to run a big, rambunctious country like the United States.

Source: Larry Elowitz, *Introduction to Government*, 1992

This list highlights some of the key steps along the path to the presidency.

1 Raise a few million. To demonstrate that you have broad national appeal, you've got to raise at least $5,000 from small contributors (contributions of $250 or less) in at least 20 different states—that's $100,000 and it's the bare minimum to get started as a candidate. You'll need every penny.

2 Take a stand that will appeal to both the public and people who are active in your political party.

3 Hire some help. Get a handler to make you look good. Professionals are available to help you package yourself so that you'll have maximum appeal. Hire a spin-doctor to package you for the media and help you put the most positive spin on everything that happens. It's vital that you seem credible and attractive to the print and broadcast media. Special consultants can help.

4 Declare your candidacy early enough to become a household name before the first primary. Some candidates now become visible more than 15 months before Election Day.

5 Buy opinion polls to find out what the public thinks of you, your issues, and your opponents. Make changes to increase your appeal.

6 Keep good records. You've got to be able to show where all your campaign contributions came from if you expect to receive matching federal campaign funds. Each candidate must turn in periodic reports to the Federal Election Commission to detail both income and expenditures.

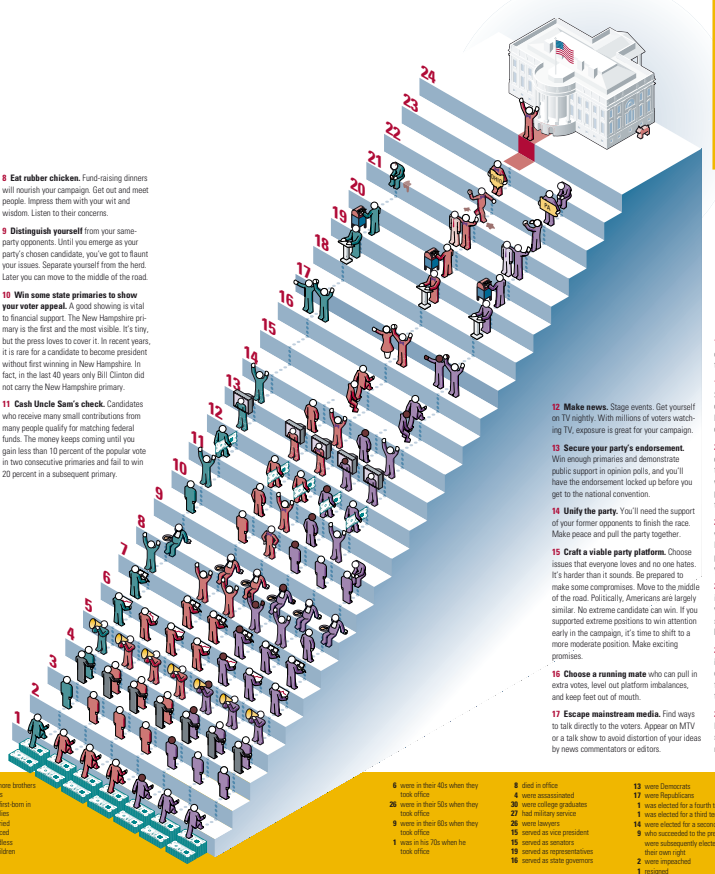
7 Win in a straw poll. Straw polls are trial elections that state parties use for fund-raising and publicity. The results of these elections don't count, but if you make a good showing, you'll get lots of positive publicity. The Iowa caucus is typically the first and most visible straw poll.

8 Eat rubber chicken. Fund-raising dinners will nourish your campaign. Get out and meet people. Impress them with your wit and wisdom. Listen to their concerns.

9 Distinguish yourself from your same-party opponents. Until you emerge as your party's chosen candidate, you've got to flaunt your issues. Separate yourself from the herd. Later you can move to the middle of the road.

10 Win some state primaries to show your voter appeal. A good showing is vital to financial support. The New Hampshire primary is the first and the most visible. It's tiny, but the press loves to cover it. In recent years, it is rare for a candidate to become president without first winning in New Hampshire. In fact, in the last 40 years only Bill Clinton did not carry the New Hampshire primary.

11 Cash Uncle Sam's check. Candidates who receive many small contributions from many people qualify for matching federal funds. The money keeps coming until you gain less than 10 percent of the popular vote in two consecutive primaries and fail to win 20 percent in a subsequent primary.



12 Make news. Stage events. Get yourself on TV nightly. With millions of voters watching TV, exposure is great for your campaign.

13 Secure your party's endorsement. Win enough primaries and demonstrate public support in opinion polls, and you'll have the endorsement locked up before you get to the national convention.

14 Unify the party. You'll need the support of your former opponents to finish the race. Make peace and pull the party together.

15 Craft a viable party platform. Choose issues that everyone loves and no one hates. It's harder than it sounds. Be prepared to make some compromises. Move to the middle of the road. Politically, Americans are largely similar. No extreme candidate can win. If you supported extreme positions to win attention early in the campaign, it's time to shift to a more moderate position. Make exciting promises.

16 Choose a running mate who can pull in extra votes, level out platform imbalances, and keep feet out of mouth.

17 Escape mainstream media. Find ways to talk directly to the voters. Appear on MTV or a talk show to avoid distortion of your ideas by news commentators or editors.

18 Debate. Demonstrate your ability to think on your feet and show voters that you are fit to be a president.

19 Get out the vote any way you can. Stimulate volunteer efforts. Mailings, phone calls, and ads are expensive. And priceless. Meet the voters face to face. Do it while the cameras are rolling.

20 Return favors. Support your party's local candidates loyally if you expect party support to keep you afloat. Visit the cities and states where local elections are close to give your party's candidates a boost. Help them and they'll help you.

21 Sling mud but wear Teflon. Disparage your opponent's record and values carefully. Negative campaigning can backfire. Be prepared to counter low blows directed your way.

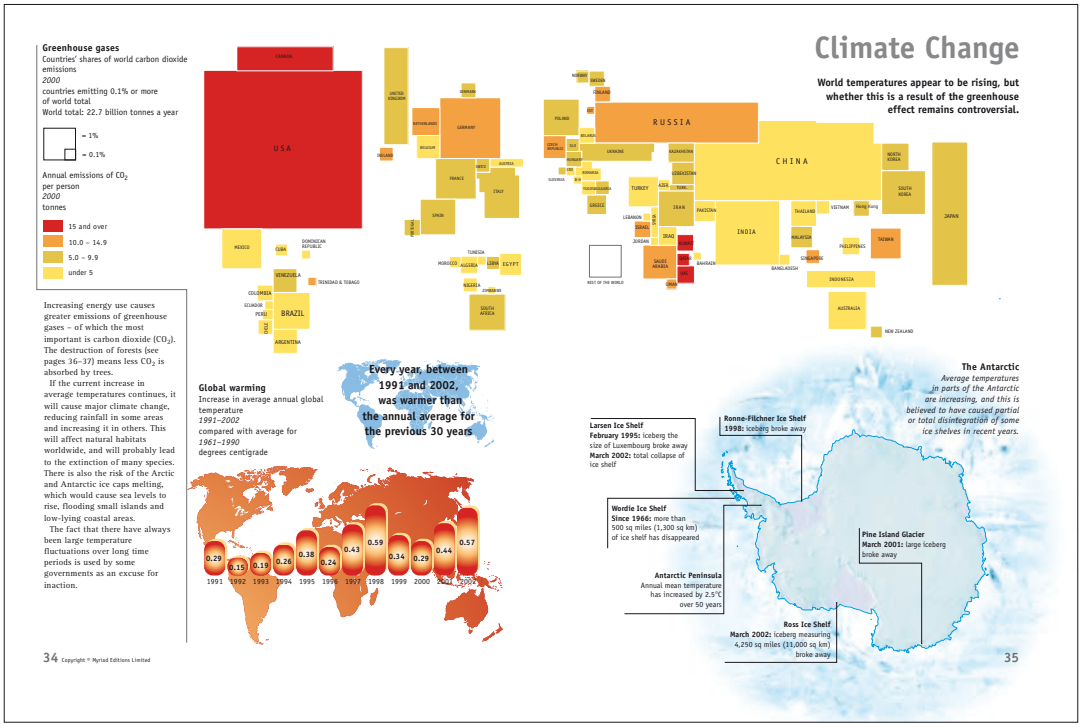
22 Target swing states. Don't waste time in states where you're likely to lose or where you have a strong lead. Go to the undecided states where electoral votes are plentiful and hit hard.

23 Don't stop running until the last vote is cast. Your official presidential campaign ends on Election Day—the Tuesday after the first Monday in November. Don't plan any time off until the race is over.

24 Get to work. The race was the easy part. Now it's time to make good on your promises so that four years from now, you can win the race all over again.

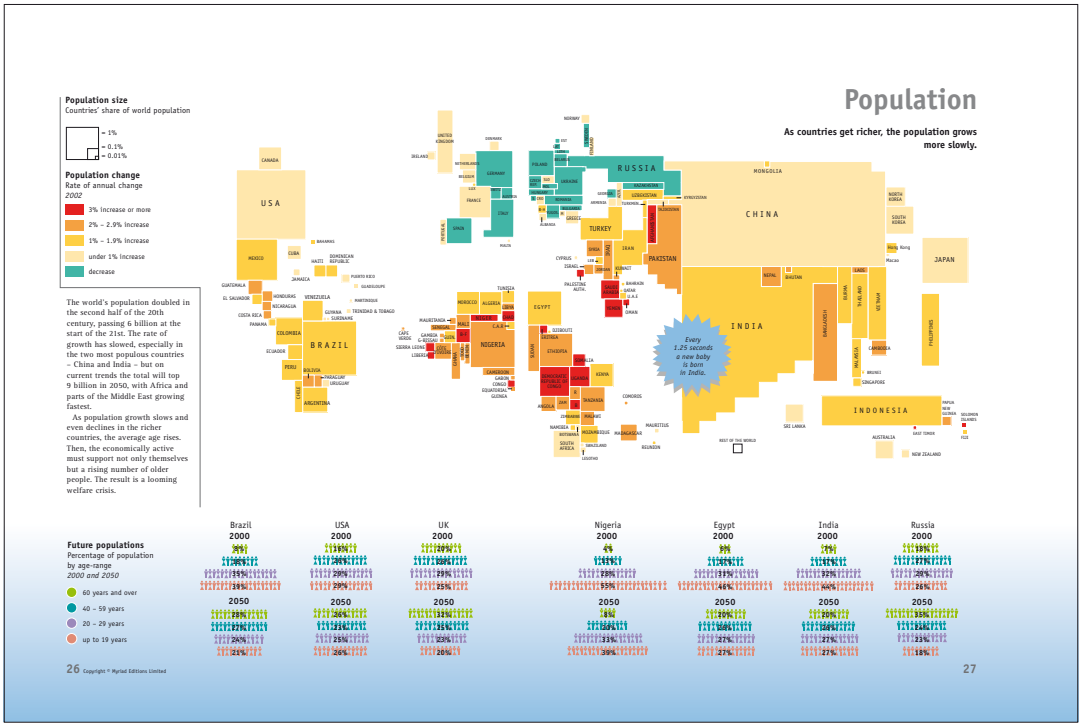
Presidential Trivia
Of the 42 presidents...
19 were born in New York, Ohio, or Virginia
21 had fathers who were farmers or planters
1 had a father who was president
1 had a grandfather who was president
18 had 6 or more brothers and sisters
13 were the first-born in their families
41 were married
1 was divorced
6 were childless
1 had 15 children
6 were in their 40s when they took office
26 were in their 50s when they took office
9 were in their 60s when they took office
1 was in his 70s when he took office
8 died in office
4 were assassinated
30 were college graduates
27 had military service
26 were lawyers
15 served as vice president
15 served as senators
19 served as representatives
16 served as state governors
13 were Democrats
17 were Republicans
1 was elected for a fourth term
1 was elected for a third term
14 were elected for a second term
9 who succeeded to the presidency were subsequently elected in their own right
2 were impeached
1 resigned

Code of Federal Regulations. Government Printing Office. U.S. www.access.gpo.gov/nara/cfr/
The Code of Federal Regulations (CFR) is a codification of the general and permanent rules published in the Federal Register by the Executive departments and agencies of the Federal Government.

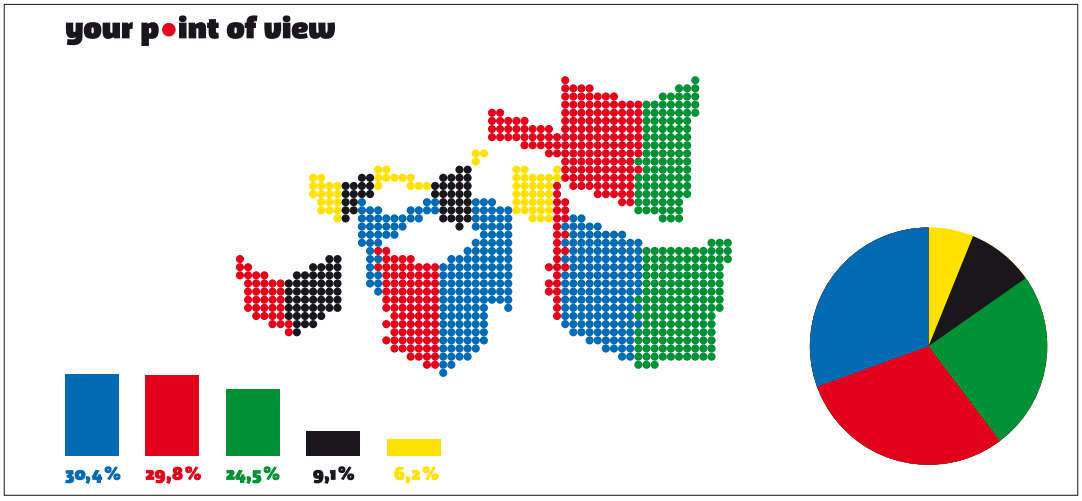


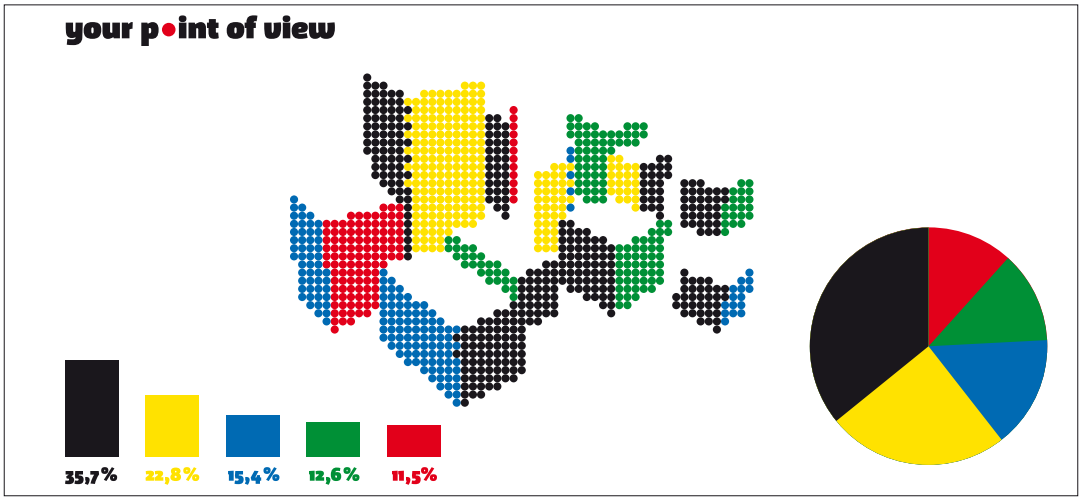
State of the world Atlas *Dan Smith* 2003

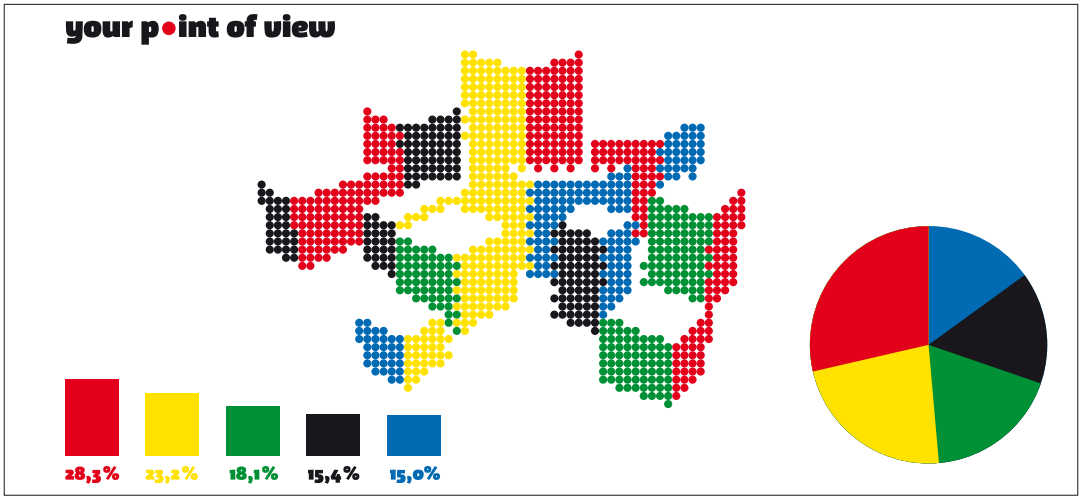
This overview uses similar visual statistical methods as Neurath's and Arntz's Atlas. The distortions, which result from representing countries according to their influence on climate change or their populations, instead of the way we are used to, are interesting. Although in terms of population some countries are much smaller or bigger than their actual geographical size, the overall form of the world map remains recognizable in this representation.



Copyright © Myriad Editions Limited


your p•int of view
30,4%
29,8%
24,5%
9,1%
6,2%

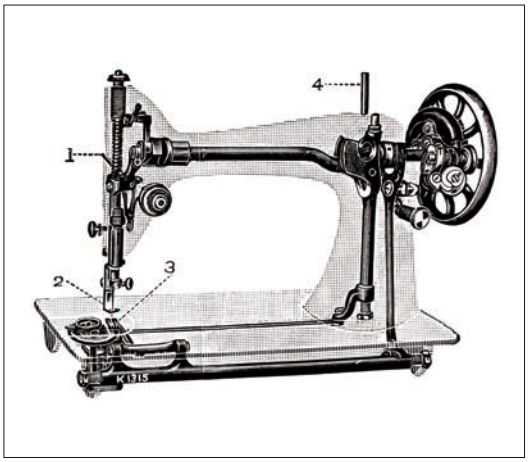

your p•int of view
35,7%
22,8%
15,4%
12,6%
11,5%


your p•int of view
28,3%
23,2%
18,1%
15,4%
15,0%



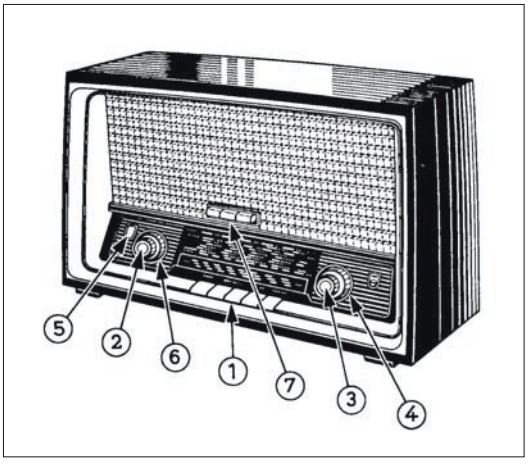
Point of view *Edgar Walthert* 2007

An installation, which exposes the manipulative qualities of diagrams. From every angle this statistic looks different: seen from one angle, red is the dominant colour, but from another angle blue or another colour prevails. The data remain the same - the blocks and their respective positions do not change -, but the way this diagram is read is, literally, dependent on the observer's point of view. A graphic lesson in distrusting seemingly objective data.



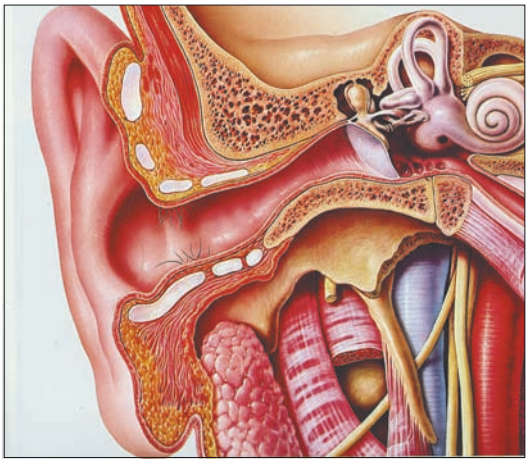


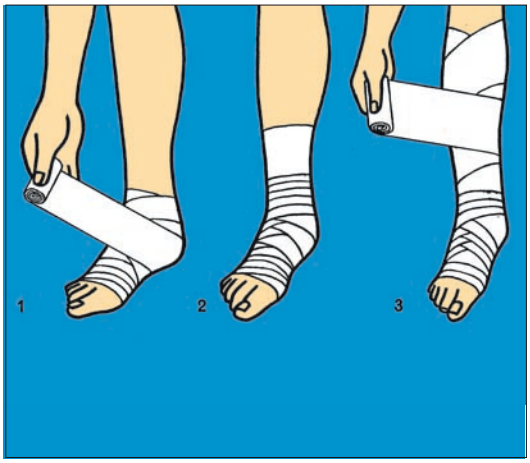


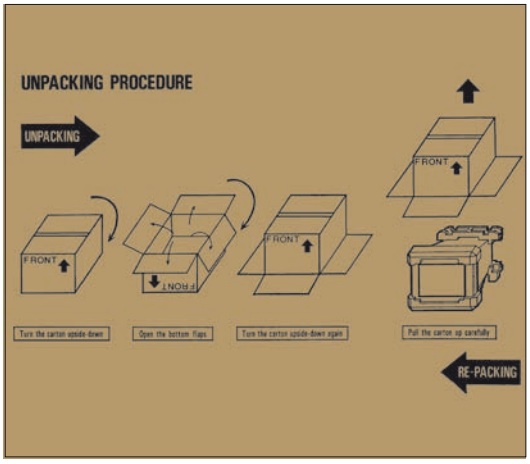


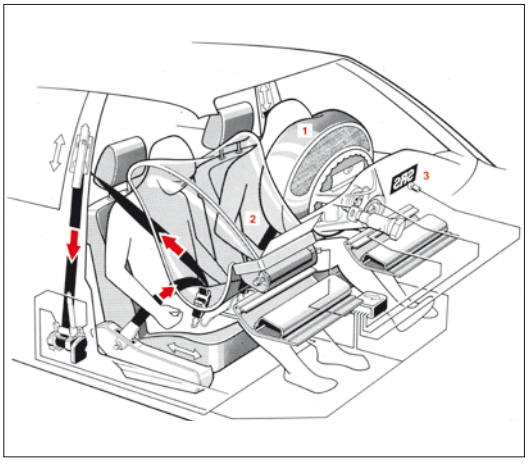
User manuals (from: Open Here) *Paul Mijksenaar, Piet Westendorp* 1999

User manuals and 'exploded views' are an underestimated but important category of information design. The book 'Open Here' shows how it's done, and where it often goes wrong. What counts is the balance of abstraction and recognisability, the composition, the design and placement of symbols and typography, the orchestration of lines, arrows and other visual connections, and above all the logical organization of steps in an efficient lay-out. Issues, which have been studied already by Neurath and Arntz, and which still determine whether a manual works or merely deepens the user's frustration.

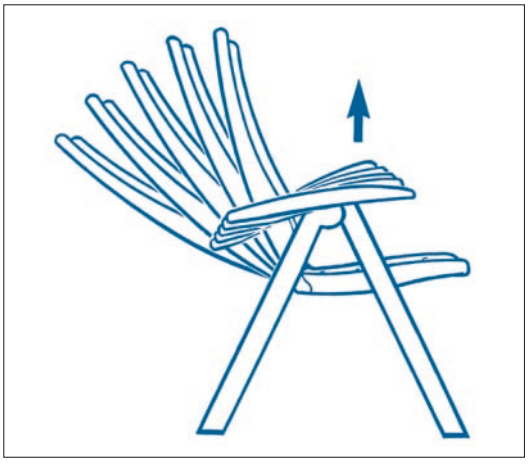


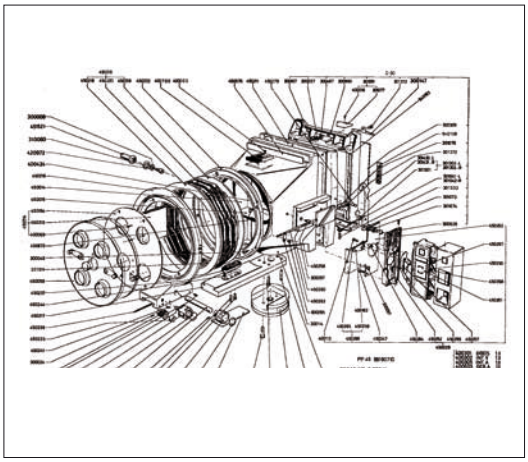

1
2
3

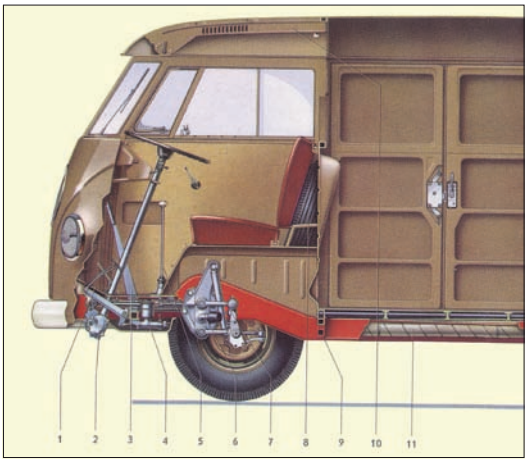

UNPACKING PROCEDURE
UNPACKING
FRONT
FRONT
FRONT
FRONT
Turn the carton upside down
Open the bottom flaps
Turn the carton upside down again
Pull the carton up carefully
RE-PACKING

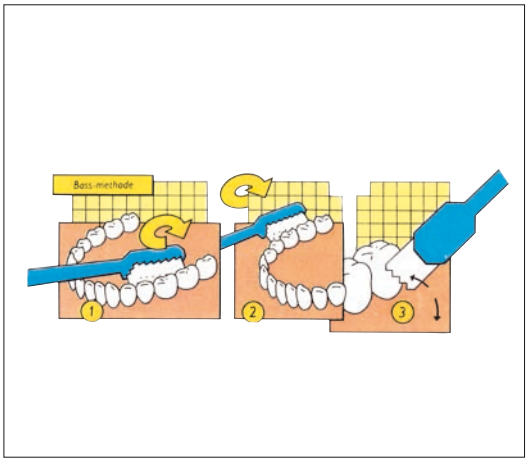

1
2
3
BIKE

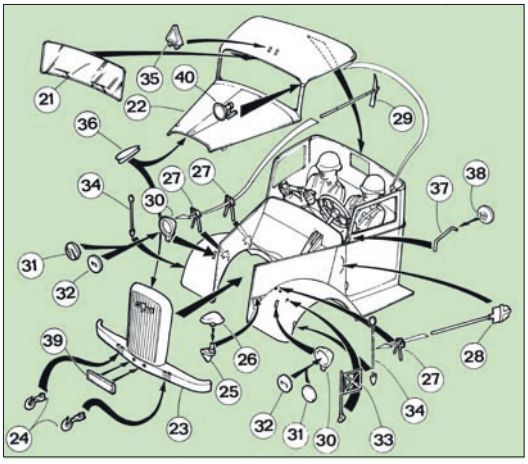


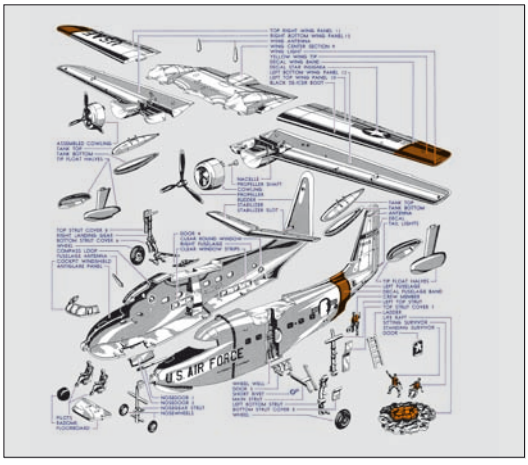


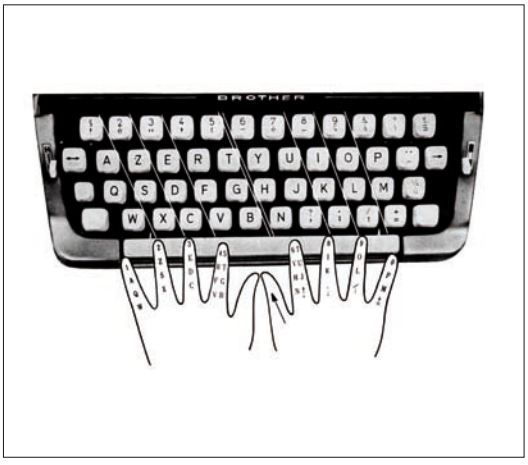


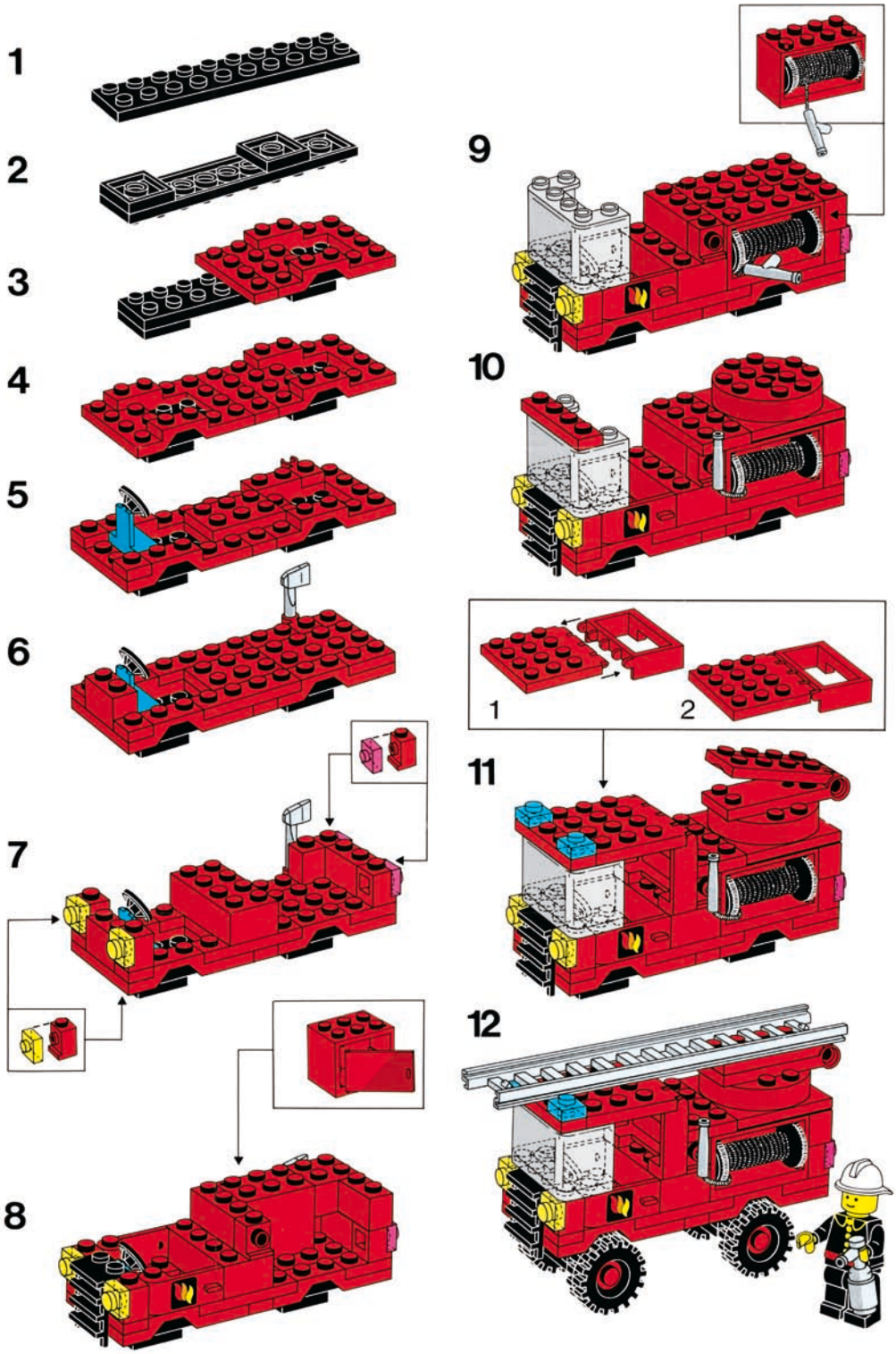

1
2
3
4
5
6
7
8
9
10
11


Bass-methode
1
2
3


21
35
40
22
36
29
34
27
27
30
38
37
31
32
39
26
28
25
27
34
24
23
32
31
30
33

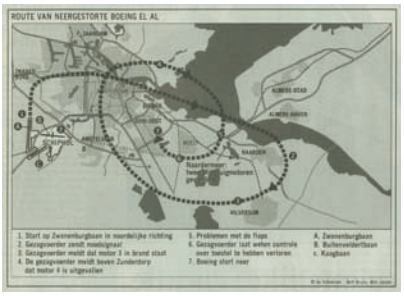

U.S. AIR FORCE


BROTHER

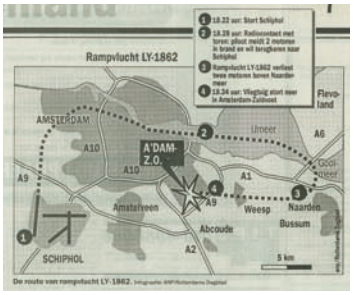

1
2
3
4
5
6
7
8
9
10
1
2
11
12


Amsterdam'daki uçak kazası
HOLLANDA
BELÇİKA
AMSTERDAM
A9
E19
HAVAALANI
Uçağın düştüğü Bijlmermeer alanı
Uçak iki motorun arızasından sonra havaalanına geri dönmek istedi
5 miles

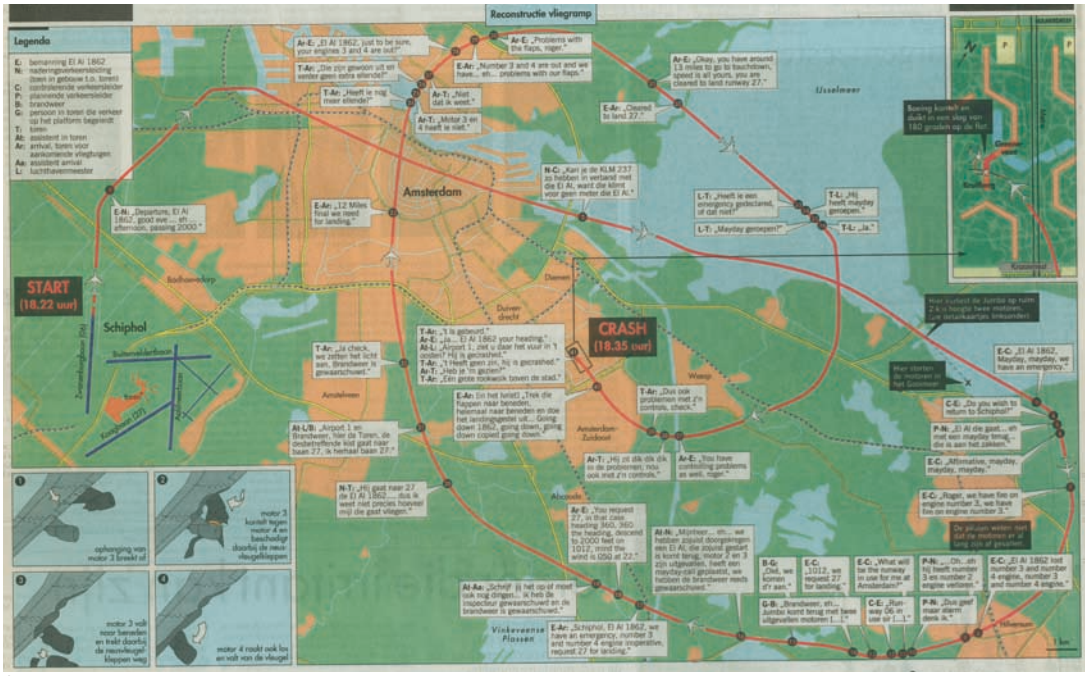
1


ROUTE VAN NEERGESTORTE BOEING EL AL
1. Start op Zwanenburgbaan in noordelijke richting
2. Gezagvoerder zendt noodsignaal
3. Gezagvoerder meldt dat motor 1 in brand staat
4. De gezagvoerder meldt boven Zuiderburg dat motor 4 is uitgevallen
5. Problemen met de flaps
6. Gezagvoerder laat weten controle over toestel te hebben verloren
7. Boeing stort neer
A. Zwanenburgbaan
B. Buitenveldertbaan
C. Kaagbaan

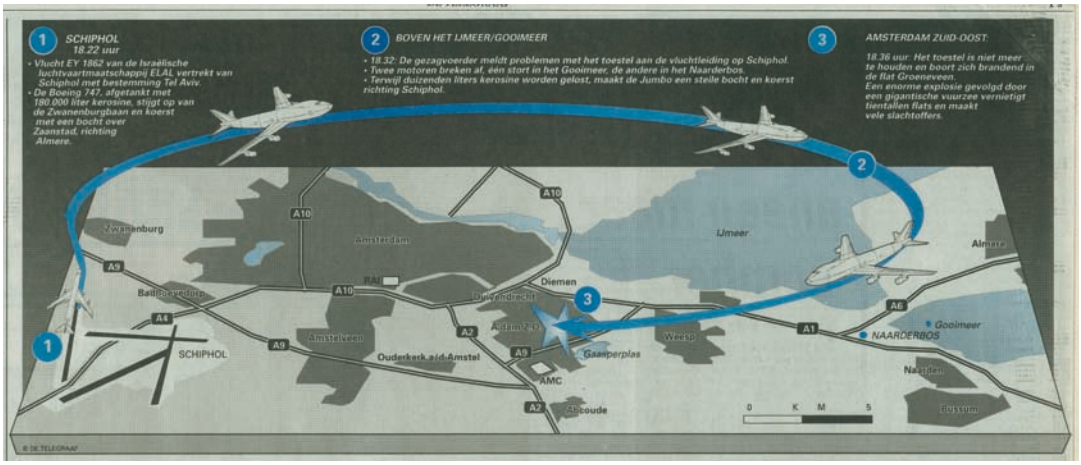
2


Rampvlucht LY-1862
AMSTERDAM
A'DAM Z.O.
SCHIPHOL
Amstelveen
Weesp
Abcoude
Naarden
Bussum
IJmeer
Flevoland
5 km

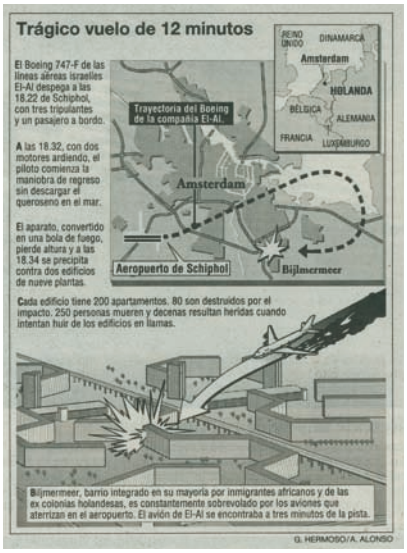
3


Reconstructie vliegramp
Legenda
START (18.22 uur)
CRASH (18.35 uur)
Schiphol
Amsterdam
IJsselmeer
Diemen
Amstelveen
Weesp
Abcoude
Vinkeveense Plassen

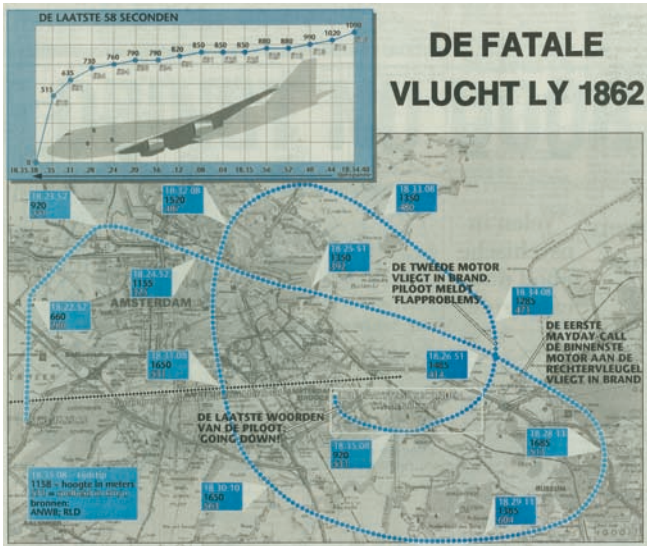
4


1 SCHIPHOL
18.22 uur
• Vlucht LY 1862 van de Israëlische luchtvaartmaatschappij EL AL vertrekt van Schiphol met bestemming Tel Aviv.
• De Boeing 747, afgetankt met 180.000 liter kerosine, stijgt op van de Zwanenburgbaan en koerst met een bocht over Zaanstad, richting Almere.
2 BOVEN HET IJMEER/GOOIMEER
• 18.32: De gezagvoerder meldt problemen met het toestel aan de vluchtleiding op Schiphol.
• Twee motoren breken af, één stort in het Gooimeer, de andere in het Naarderbos.
• Terwijl duizenden liters kerosine worden gelost, maakt de Jumbo een steile bocht en koerst richting Schiphol.
3 AMSTERDAM ZUID-OOST
18.36 uur: Het toestel is niet meer te houden en boort zich brandend in de flat Groeneveen.
Een enorme explosie gevolgd door een gigantische vuurzee vernietigt tientallen flats en maakt vele slachtoffers.
Zwanenburg
A10
Amsterdam
IJmeer
Almere
A9
Badhoevedorp
RAI
Diemen
Duivendrecht
A4
A2
Amstelveen
Ouderkerk aid Amstel
Gaasperplas
Weesp
A1
A6
Gooimeer
NAARDERBOS
SCHIPHOL
AMC
Abcoude
Naarden
Bussum
0 K M 5

5



6



7



8

1 Türkiye 10.07.1992
2 De Volkskrant 10.06.1992
3 Rotterdams Dagblad 10.05.1992
4 NRCHandelsblad 01.21.1999
5 De Telegraaf 10.05.1992
6 El Pais 10.06.1992
7 Algemeen Dagblad 10.06.1992
8 De Courant 10.06.1992

Newspaper infographics

"How do people best receive information? and: How do we sell newspapers?" USA Today's art director Sam Ward answered to both questions: 'Infographics.' These contemporary successors to the old visual statistics summarize the news in newspapers and magazines in an attractive and visual way. The influence of Isotype is apparent, but one often also notes that the artists are better versed in drawing a dramatic image than in the correct translation of data into its symbolic representation. Compare and contrast, for instance, the infographics of the Amsterdam plain crash in 1992. Essential in the chain of events leading up to the disaster is that the crippled plane had to make an extra turn over Amsterdam before it was cleared to land. It was a turn too many. The central image on the left gives the most accurate account. For reasons of aesthetics, laziness or ignorance, some other graphics only depict one turn, and in one case - the Turkish newspaper, top left - completely misrepresent the event.

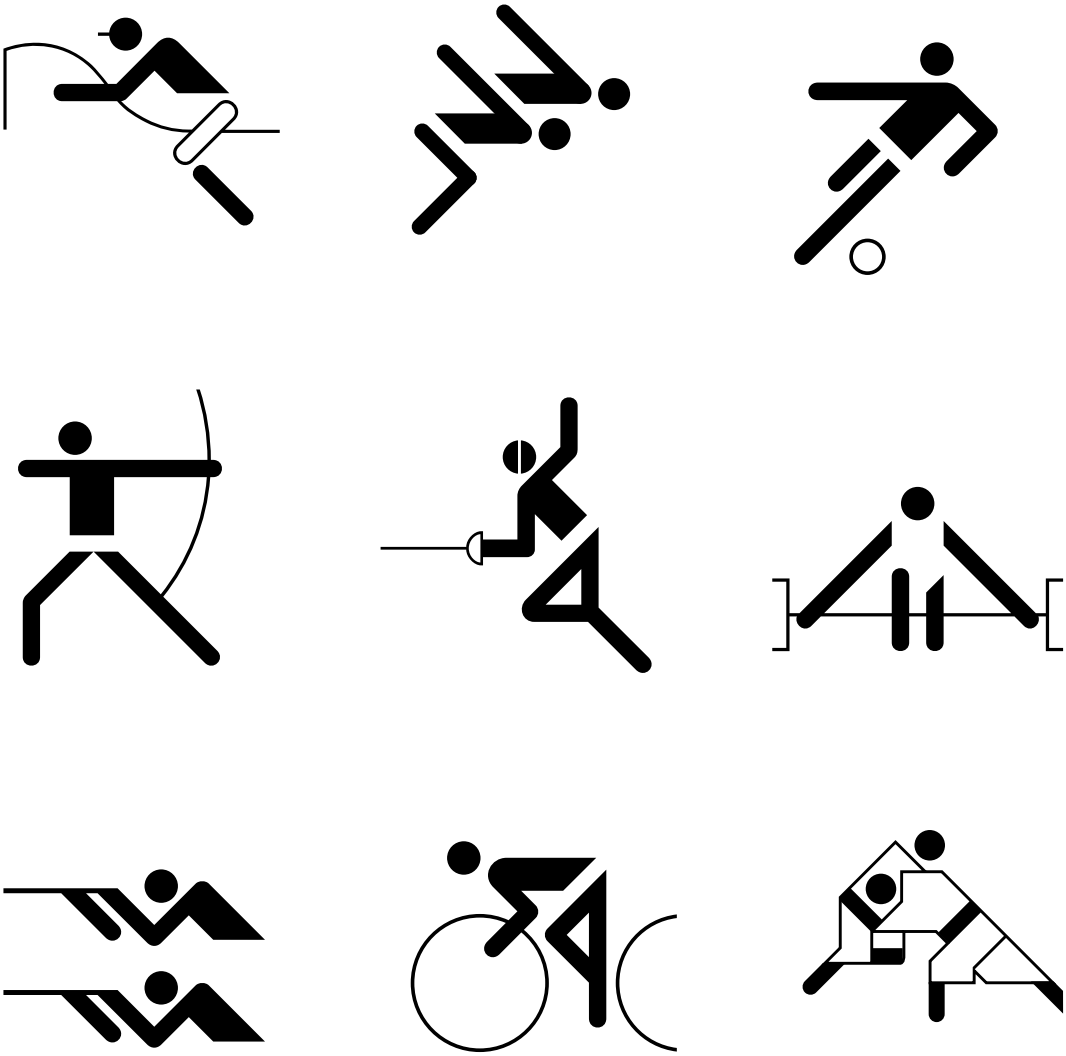






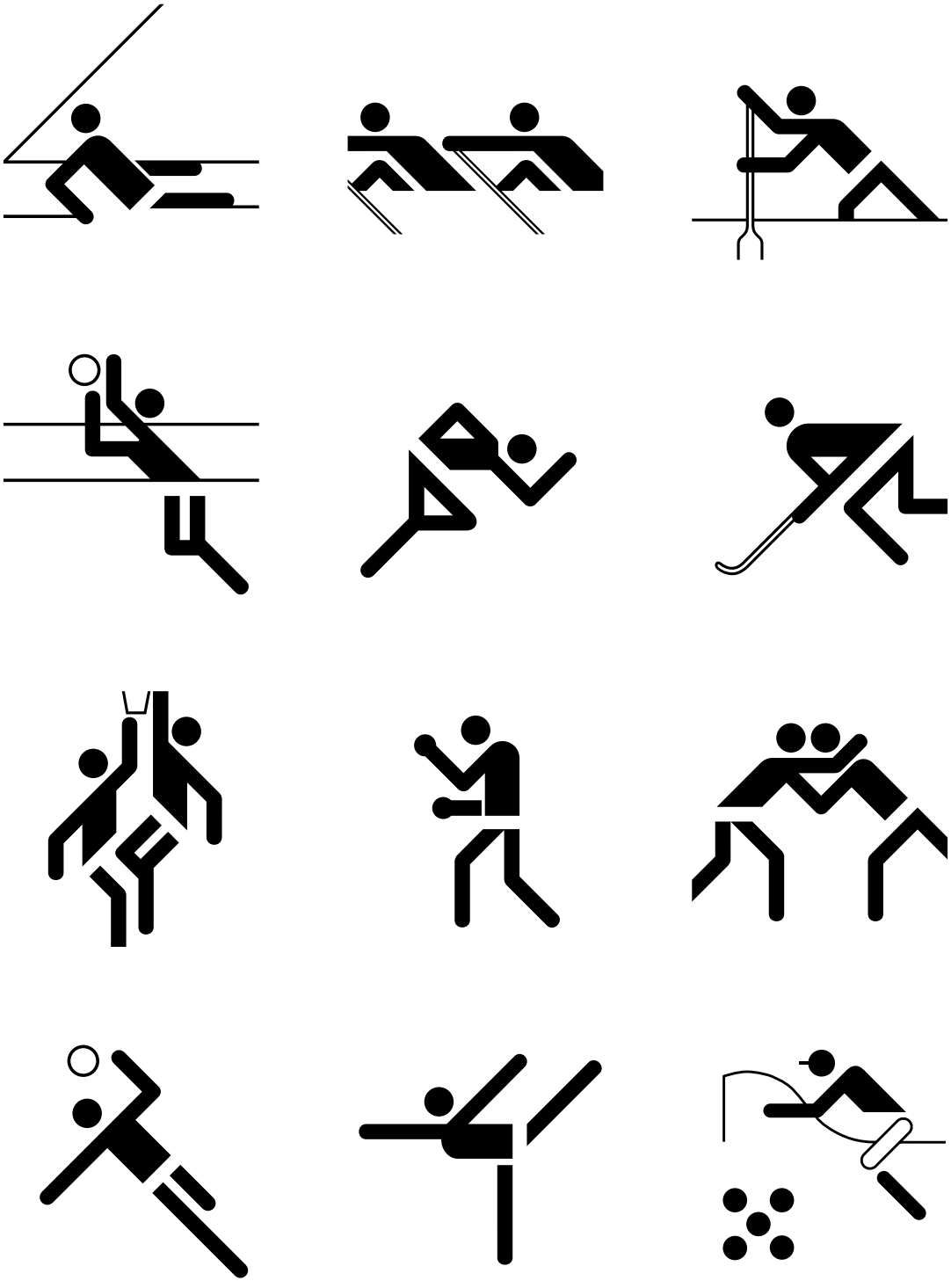
Pictograms

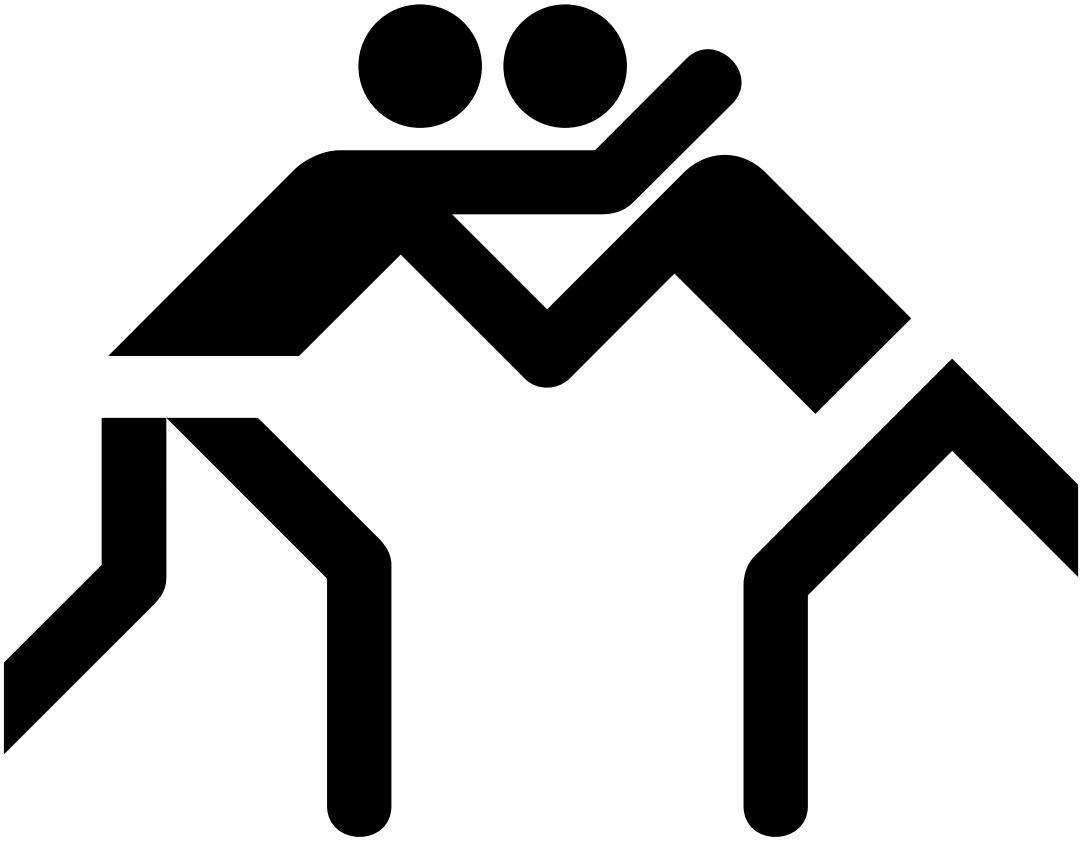
Pictograms are the words of a visual language. Neurath and Arntz were among the first to understand that, in the right context, an abstracted image is easier to read than a row of words. Today, pictograms can be seen everywhere there are people with too little time or attention for reading lengthy texts, or where various languages are spoken - in airports, at international events such as the Olympic Games, or on packages.
Neurath and Arntz are pioneers in developing concise pictograms for basic concepts, but their work has been greatly expanded by other designers. Apart from designers like Henry Dreyfuss, who have given erudite overviews of existing symbols and who perfected them or added to them, many designers have given new directions by tackling limited assignments in depth. Otl Aicher is one of them: with his set of pictograms devoted to the Olympic sports, he set a standard for designing pictograms for man in action in general. And the set of pictograms which was developed by the AIGA for use in public transportation has become a gauging point for designing pictograms in public space.
Another pioneering area was that of the graphic user interface, which needs pictograms to indicate functions and properties of computer applications and 'digital objects'. Susan Kare was a pioneer here, who designed many of the pictograms that we now consider integral parts of the natural environment of the computer.
As with any language, one has to learn how to read and 'write' pictograms. But with the growing spread of pictograms in every thinkable visual communication environment, designers can increasingly rely on the ability of users to recognize and understand them. And they are increasingly making their own versions of them - spawning pictographic styles and dialects. While some take the abstraction, inherent in pictogram design, to a more decorative level, others return to a more 'realistic' approach towards depicting the human figure. Corporeal human silhouettes as in pictograms by Gert Dumbar or Ruedi Baur indicate that designers take a step back from the technologically inspired aesthetics of their predecessors. And that they feel free to interpret the models that have been firmly established by now.



Olympic Games Munich *Otl Aicher* 1972

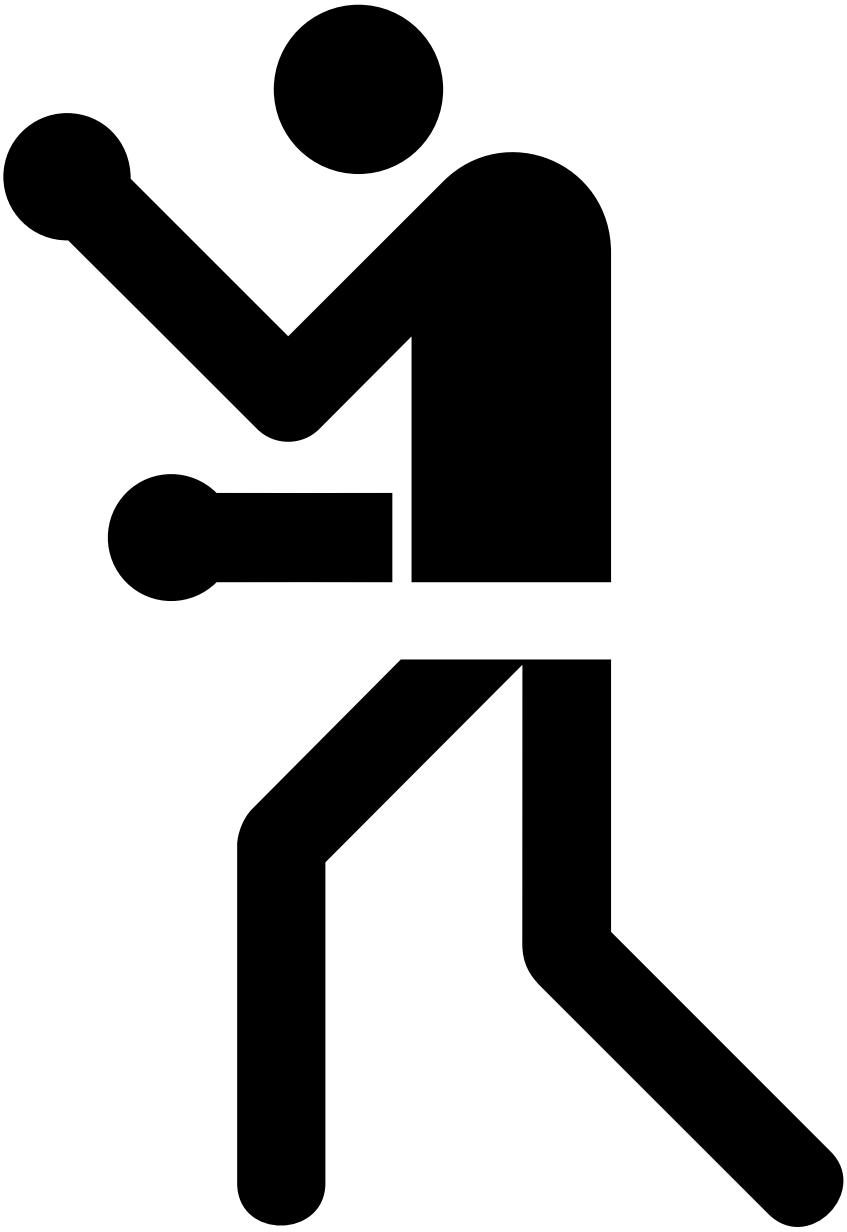
Since their publication, Aicher's pictograms are seen as standard reference, not only in the field of sports, but for designing pictograms in general. His combinations of lines and volumes within a grid which allows horizontal, vertical and diagonal lines, reminds of Arntz's abstraction, but also of the method that Henry Beck developed in the 1930s for mapping the London Underground.



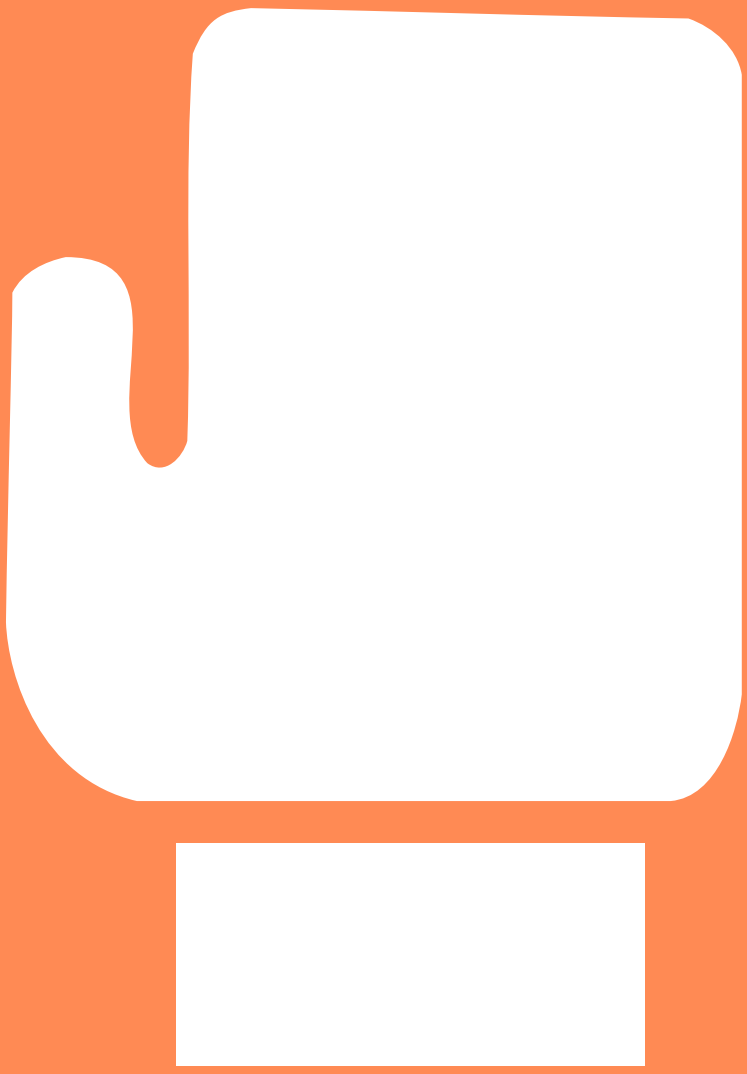


Left: Olympic Games Munich *Otl Aicher* 1972
Right: Olympic Games Barcelona *Josep Maria Trias* 1992
A comparison between Otl Aicher's and Josep Maria Trias's symbols for wrestling shows that Trias is clearly inspired by the structure of Aicher's example, but that his interpretation is much more dramatic and decorative than the German designer's radical reductionism. Trias's almost calligraphic brush strokes make the figure look like a Chinese character rather than a pictogram. Perhaps we can recognize these symbols only because we have become so familiar with their model, Aicher's pictograms of abstracted people in action.



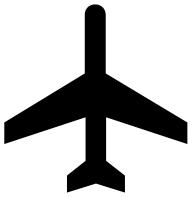


Left: Olympic Games Munich *Otl Aicher* 1972
Right: Olympic Games Mexico *Lance Wyman* 1968
Two ways of symbolizing a sports genre: by the typical posture of the sports person, as Aicher did, or by their typical attribute, in this case the boxing glove in Wyman's Olympic series. Aicher's approach has been adopted more widely, because it doesn't have to compromise itself in case a sport has no characteristic tool like a ball. What, for instance, would be the attribute of swimmers, or runners?



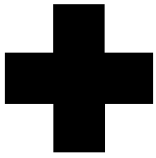


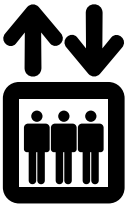
Passenger symbols for public space *AIGA (Roger Cook, Don Shanovski)* 1974/1979
By invitation of the U.S. Department of Transportation, the American graphic designers association AIGA developed a set of 50 generally used pictograms. The idea was to set an international standard, and thereby avoid confusion. The set serves as gauging point for designers when they make their own pictograms, which thus 'speak' the same language, even if they vary in detailing, colour and style.

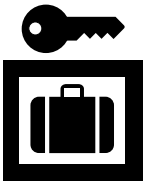










Blue (roads)


Airport


Arrivals


Departures


Bus


Car



Taxi


Car rental


Highway


Heavy traffic


Information


Offices


Commercial area


Hotel


Walk way



Parking



Parking garage



Gas station with LPG



Parking 1



Parking 2





Parking 3





A4 highway



A9 highway









Yellow (operational)


Arrivals hall


Departures


Transfer


Arrivals and departures


Arrivals hall / Exit


Walk way


Buses



Taxi


Hotel shuttle


Bus stop


Buses and hotel shuttle


Train

HST

Trains

Transfer Air-Rail

Customs

No passport control

Passport control

Baggage belt(s)

Odd size baggage

Information

Info-finder

Metal objects

Disabled (passage)

Lift

Parking

Parking pay terminals

Parking 1

Parking 2

Parking 3

Parking 7

Parking 57

Parking 9

Parking 30

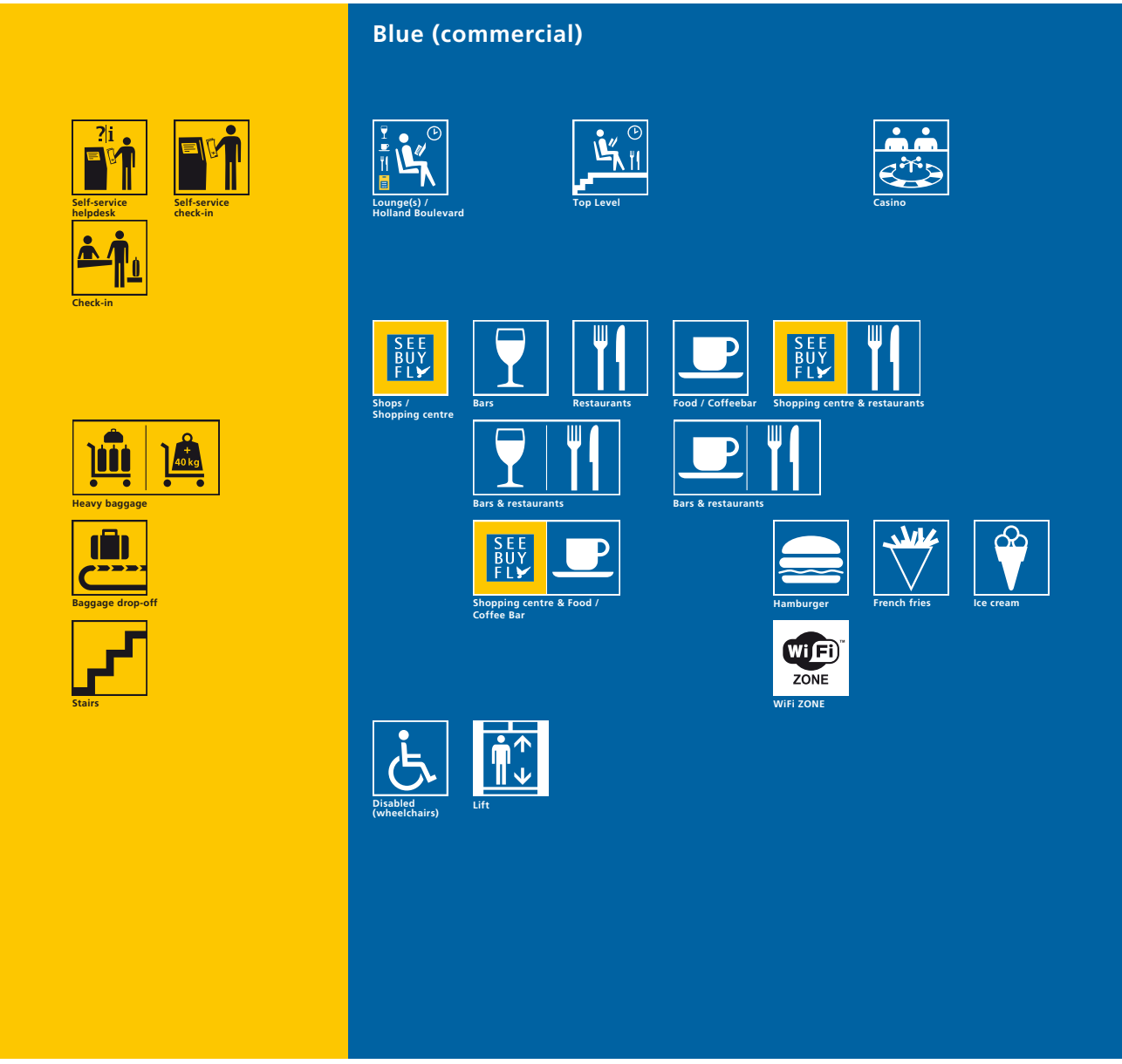
Parking 40

Baggage pick-up

Baggage drop-off

Ramp up

Ramp down



Schiphol Airport *Bureau Mijksenaar* 1991/2001

Bureau Mijksenaar's wayfinding for the vast and complex spaces of Amsterdam Schiphol Airport is internationally acknowledged as being exemplary. Together, the clear typography, the colour codes, the design of the illuminated signs and their placement form a system, which brings order into chaos for travellers. Mijksenaar's design, editing and detailing of variations of well-known pictograms make them seamlessly fit into the system.

Anthracite (facilities)



Grey (instructions, staff and crews)



Goods to declare



Nothing to declare


Basket for keys, coins etc.


Place baggage flat on belt


One piece of hand baggage only


Place coat in basket


Place laptop in basket separately


Place fluids in basket separately


Coins etc. in basket


Extra pictograms


EU

non-EU


Baggage control


Dangerous goods


Leave baggage behind


No mobiles, please


Baggage trolleys




No baggage trolleys




Take your number here


Wheel clamp


Lift


Place shoes


Disabled (wheelchairs)


No food


Video surveillance


Please help us mind your valuables


No drinking water


No photography


No food


No sleeping


Walkway ends


Pay attention


No entrance


No smoking


No dogs

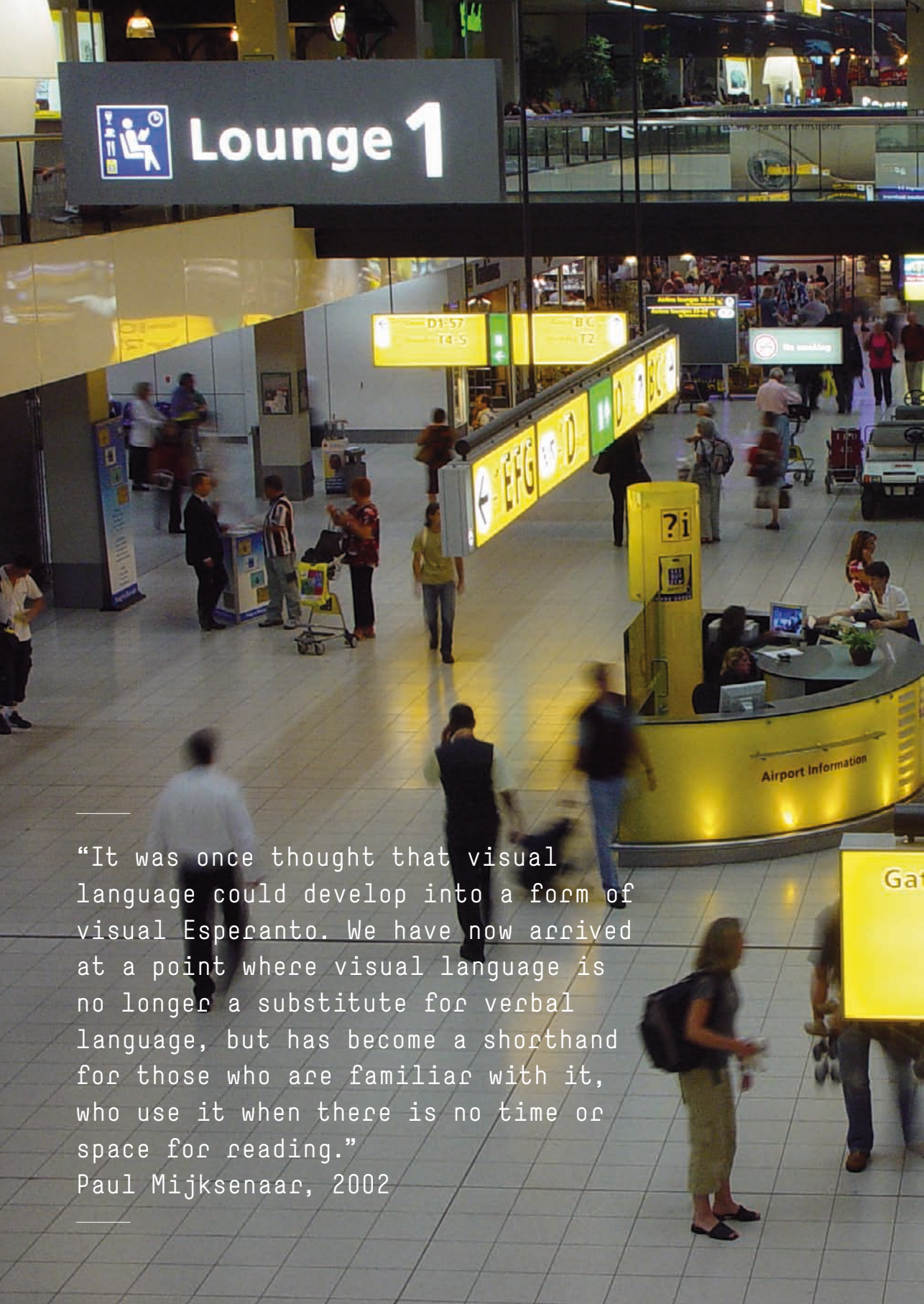

No mobile phone


No sharp objects


No wheelchairs

No heavy baggage

No baggage over 40 kg



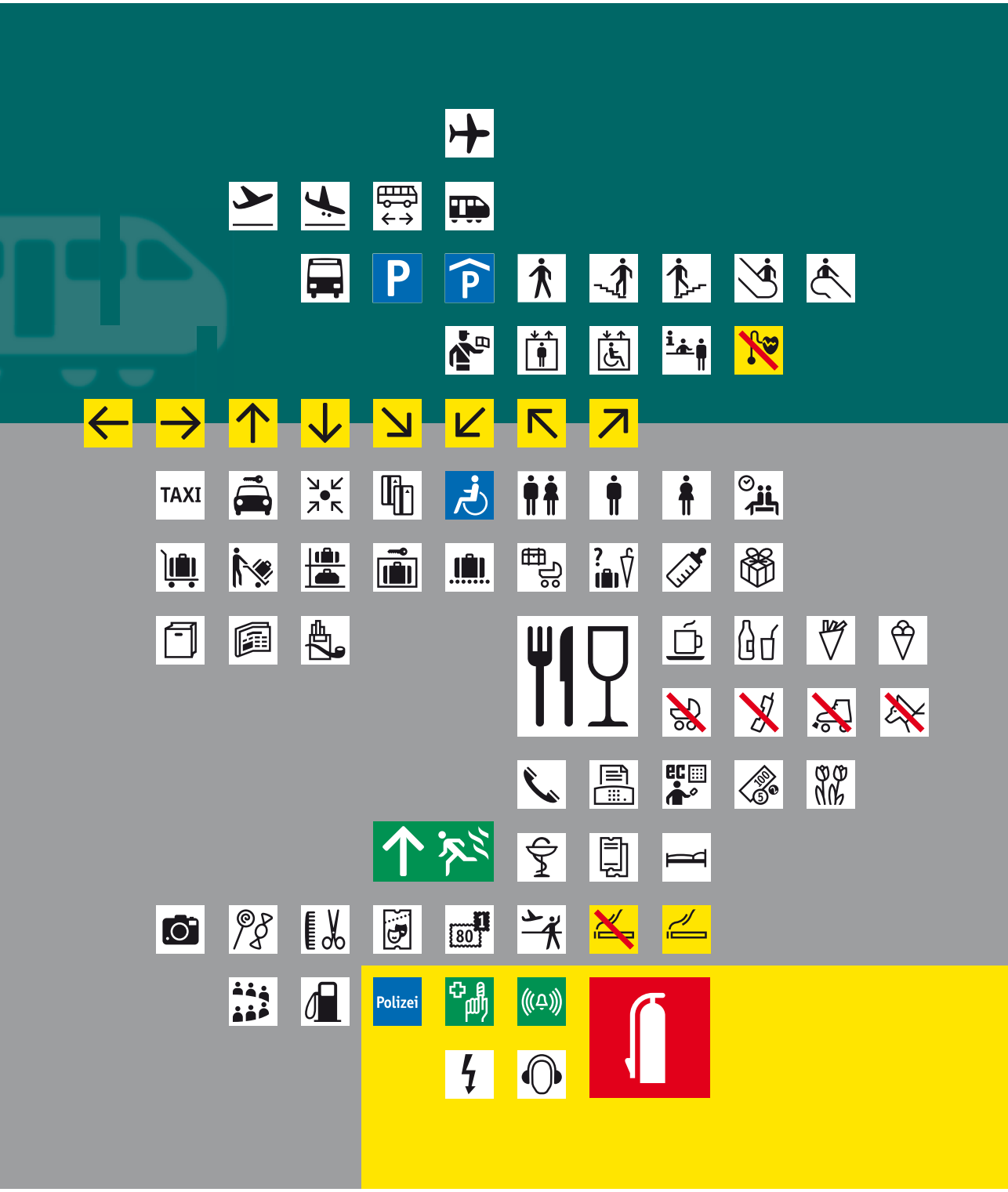
"It was once thought that visual language could develop into a form of visual Esperanto. We have now arrived at a point where visual language is no longer a substitute for verbal language, but has become a shorthand for those who are familiar with it, who use it when there is no time or space for reading."
Paul Mijksenaar, 2002

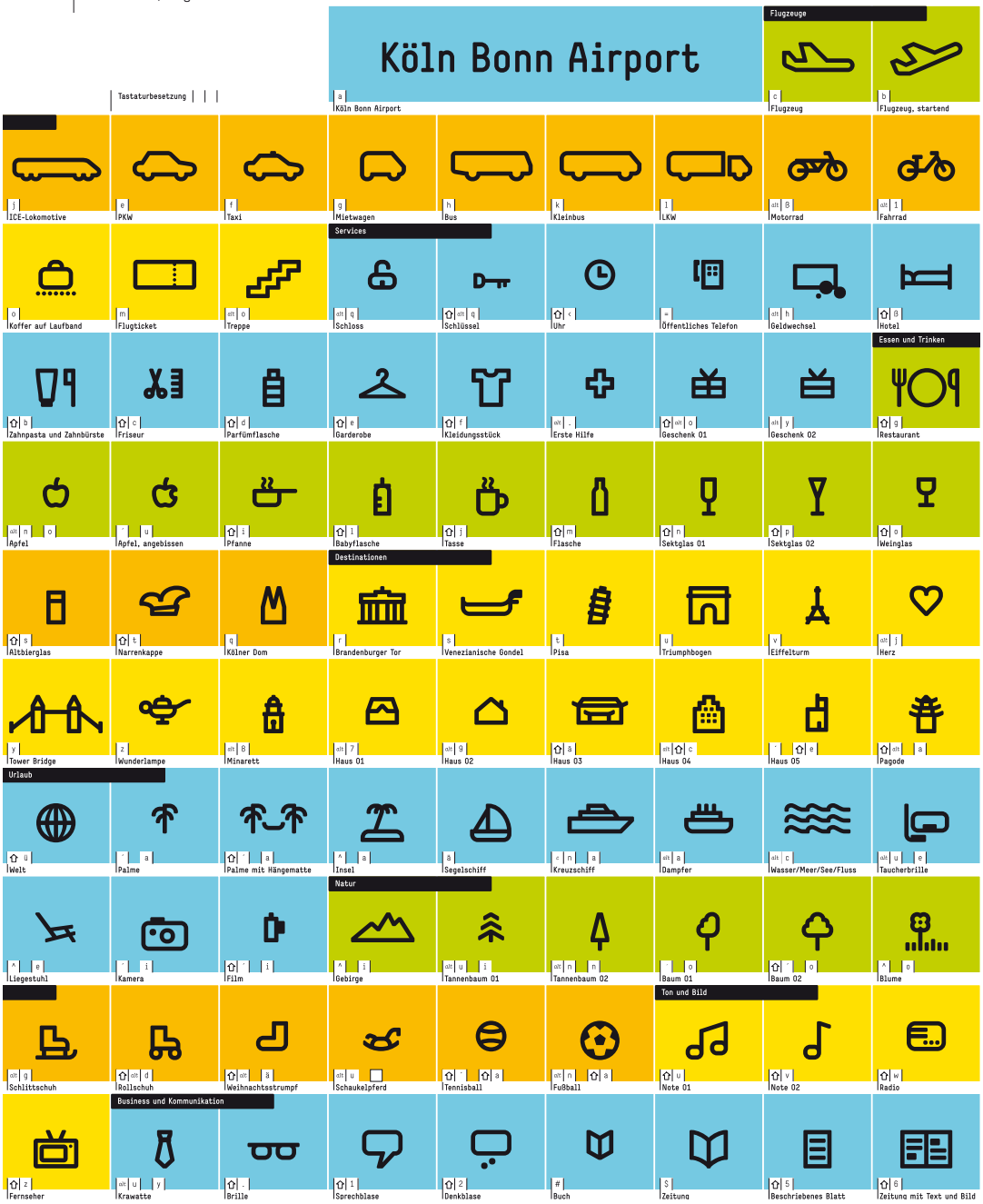

tes D59-87
Transfer T3
Bars & restaurants
Top Level
Airline lounges 25-29
By invitation only



Düsseldorf Airport *MetaDesign / Erik Spiekermann* 1996

After a major fire in April 1996, Düsseldorf Airport concluded that the 17 dead and 150 injured caused by the disaster were in part to blame to the bad signage to emergency exits. MetaDesign reorganized the wayfinding, routing and house style. The rounded-off forms of Spiekermann's FF Info font are the reference for the set of pictograms, which harks back to Aicher's Olympic pictograms. In this way, the icons and texts join together recognizably.


TAXI
P
P
80
Polizei



Köln-Bonn Airport *Intégral Ruedi Baur & Associés* 2003

'SoSimple' was the designers' motto for developing the signage for this airport, which specializes in cheap and transit flights. Cheerful colours and easy-going rounded pictograms, together with the font 'SimpleKölnBonn' (design: Norm, Zürich), form a flexible house style which wants to impart ease and holiday fun. Remarkable are the people in these otherwise round and abstract pictograms: almost corporeal contours.

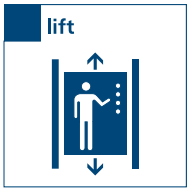

P1
WC
Taxi

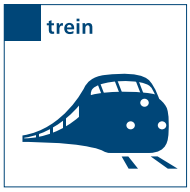














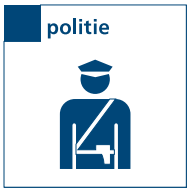










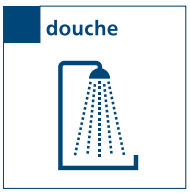














Dutch Railway Company *Bureau Mijksenaar* 1999

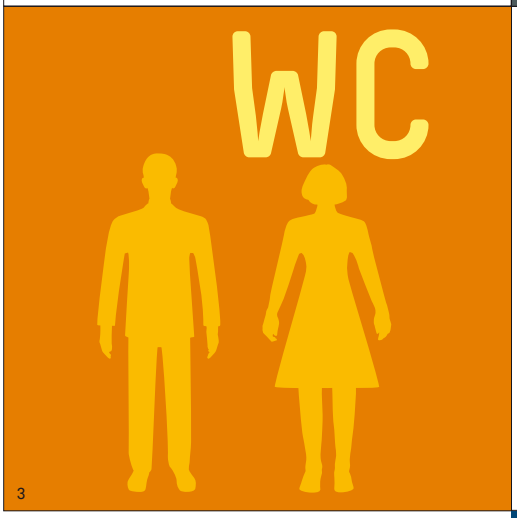
Since the Dutch Railways are a company mainly operating in the Netherlands, words can be used more freely in the wayfinding for Dutch railway stations than in pictograms for international environments such as airports. The main colour is that of the company and the detailing fits the overall house style.


spoor
2a
vak
A
fietsverhuur
informatie
i
parkeren
P
stalling
kluis
gevonden
gehandicapt
dames
heren
parkeren
P+R
taxi
TAXI
tram
luchthaven
autotrein
geen fietsen
geen honden

1 Düsseldorf Airport *Erik Spiekermann* 1996
2 Schiphol Airport *Bureau Mijksenaar* 1991/2001
3 Köln-Bonn Airport *Ruedi Baur* 2003
4 Public space *AIGA* 1974/1979
5 Dutch Railway Company *Bureau Mijksenaar* 1999


1


2



3


4



5

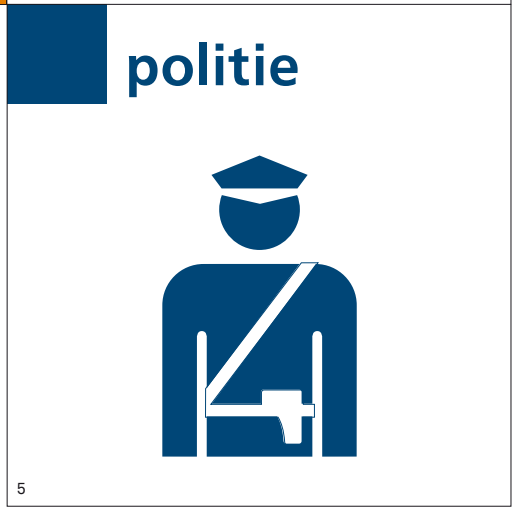
Variations on an archetype. Edgy or rounded-off, abstract or corporeal, the universal pictograms for male and female remain structurally the same in four of the signs. Only Mijksenaar, in a sign for the Dutch Railways, uses a purely typographic version, the abbreviation for the English word 'water closet', the term used in most European countries, translated in Dutch - and English - as 'toilet'.


1


2


3


4



5

The strong lines of the officer's belt accentuate authority in all but one of the pictograms. There, in the design of Ruedi Baur, the realistic silhouette of the customs officer becomes as friendly as that of a postman, carrying a softly rounded envelope.



1



2



3

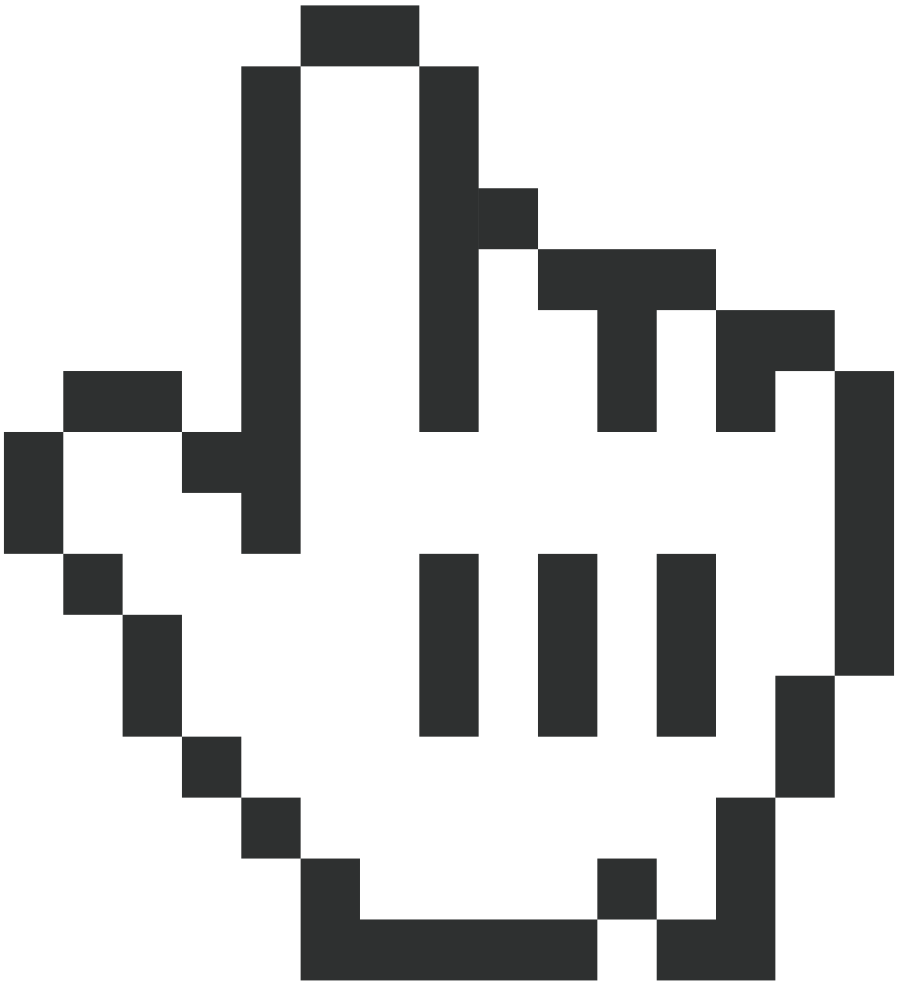


4



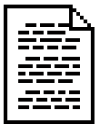
5

The majority follow the standard top-view, but Mijksenaar introduces in his pictogram for Schiphol a slight form of perspective in combining top- and side views of the plane, showing both the wings and the tail fin. Baur goes even further, and relies on the ability of air passengers to 'read perspective' and not mistake his pictogram for that of a machine with two tail fins and no wings.



Icons for the Macintosh Apple Computer *Susan Kare* 1983 - 1986

Art historian Susan Kare developed the icons for the new graphic user interface of the Apple Macintosh computer, which was launched in 1984. Her symbols have meanwhile become so familiar, used and imitated, that few realise anymore how innovative these 30 x 30 pixel masterpieces once were. As computer iconographer Kare has also designed icons for Windows, IBM and other companies, setting the standard for icon design.













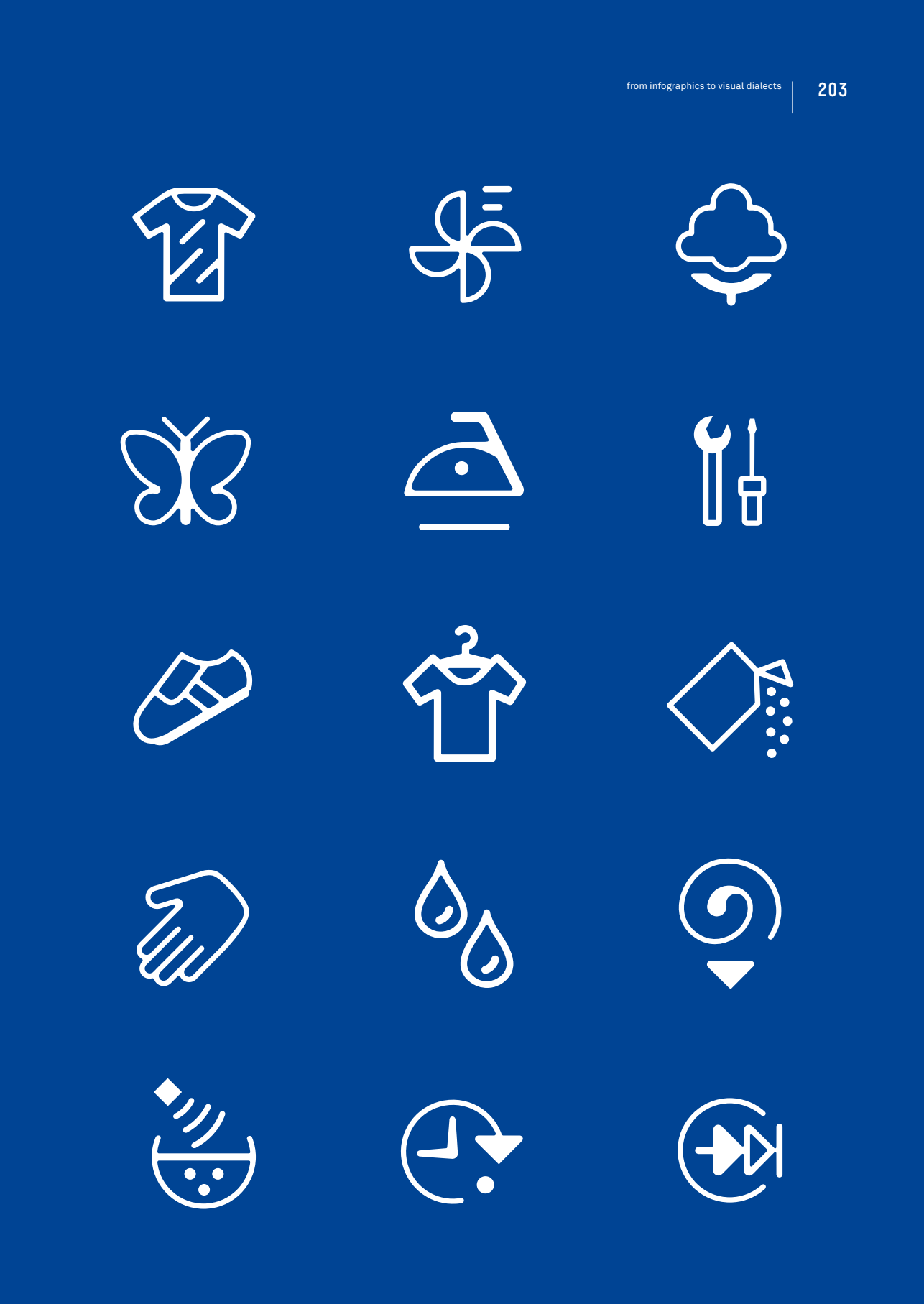






Pictograms for Gorenje washing machine *Silvija Cerne* 2004

Because more and more household appliances work with computer-controlled operation, more and more appliances feature graphic user interfaces and pictograms. For Slovenian firm Gorenje's touch screen washing machine interfaces, Silvija Cerne designed a new set of pictograms. They are in part based on standard textile symbols, partly variations of icons from other fields (play / pause), and partly new designs altogether.

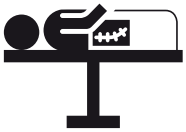




Westeinde Hospital, The Hague *Studio Dumbar* 1980

Despite their high degree of abstraction, this set of pictograms is slightly more illustrative than usual. That is the consequence of the choice to refer in almost every symbol to the outline of the human body, or head, and thus not to isolate the heart, the lungs, etcetera. With the hospital's consent, Dumbar's pictograms have been offered freely for non-commercial applications, and are used throughout the world.



















A Safe Place
Pictograms for disaster areas
Gert and Derk Dumbar, 2007

Gert and Derk Dumbar have designed a basic set of pictograms to be used in areas, where aid organizations provide basic relief to refugees and victims of natural or man-made disasters. Smooth communication is essential in such areas and under such conditions, and at the same time very hard to achieve. Helpers and the people they have come to assist may not speak the same language, people in remote areas may not be able to read, and displaced people are often quite distracted as well. The pictograms presented here are a research project, aimed at developing a basic set of pictograms that can be understood regardless of language, culture or education, to be used by relief agencies wherever there is a need to quickly organize an infrastructure for receiving and directing large masses of people seeking refuge.


MISSING PERSONS
VERMISTE PERSONEN


SHELTER
SCHUILPLAATS


P
ANIMAL STALLING
STALLING DIEREN


FORD
DOORWAADBARE PLAATS


NO VEHICLES
VERBODEN VOERTUIGEN


FLOOD WARNING
OVERSTROMINGS-
GEVAAR


VACCINATIONS
VACCINATIE


WAR ZONE
OORLOGSGEBIED

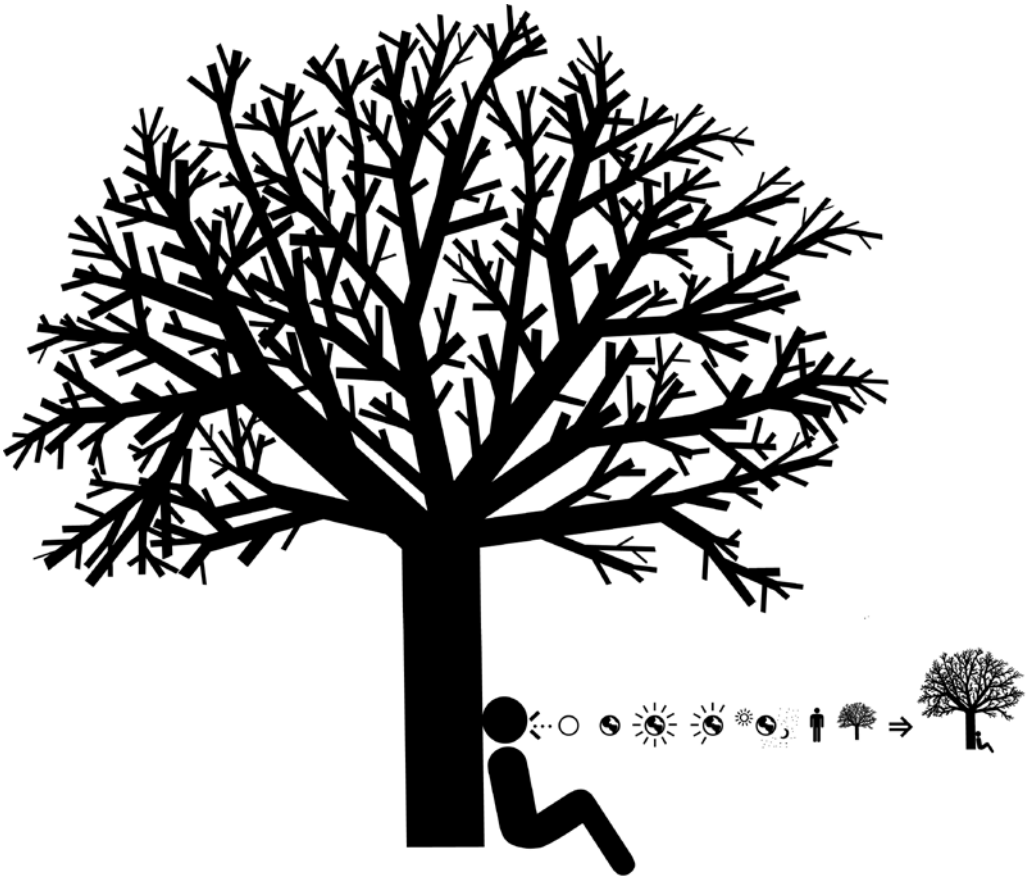


Visual language

In our times, the visual culture of abstracted images, pictograms, logos and stylized brand typographies has grown into a visual language, which can be understood world-wide. When Milton Glazer designed the now famous 'I ♥ NY' logo in 1973, he was acknowledging this fact; that one can write in pictographic symbols like one writes verbal language. Since then, a globe-spanning culture has grown that combines letters and pictorial symbols in verbal-visual words. The enormous spread of 'emoticons' and other more or less pictorial abbreviations in SMS and online messages is stimulated by technologies that provide both designers and non-professionals with ever more sophisticated means to combine and manipulate scanned images and a plethora of different fonts, 'dingbats' and small typographic and pictographic animations. The streets of any major city in the world have changed from architectural spaces into four-dimensional verbal-visual texts.

With this global dissemination, there also emerge local dialects, which can hardly be understood outside their own context. Beyond the local variations of, for instance, internationally standardized signs such as the umbrella symbol that warns to keep packages dry, pictograms and symbols are being varied and interpreted in order to communicate personal messages in stead of objective information. Pippo Lionni's variations on the arch-pictogram for 'man' are a case in point. His version of the biblical story of the creation of man and the universe consists of a mere dozen of symbols. It not only summarizes the story quite accurately, but adds a rather deeply philosophical level to it by depicting man as pondering himself in the context of the cosmos. One could argue whether Lionni states that man created himself – in other words, formulated his own vision of the world –, or more orthodox, that he resembles God. But regardless of the interpretation, it is striking how much conceptual content is acutely suggested by so few symbols.
Obviously, for someone not familiar with Christian mythology and symbolics, Lionni's concise visual essay will be considerably less meaningful. This said, should we conclude that we are back where we

began, in a new Babel, this time with images that we can misunderstand? Visual language, once designed by idealist modernists for universal objective communication, is increasingly used to formulate subjective opinions or to write visual poetry. Globalization – the result of modernist production methods – is confronted with cultural boundaries. Still, the growing idiosyncrasy in visual dialects is also a sign of a grown-up language, in which one can express things which not everyone can or wants to understand.



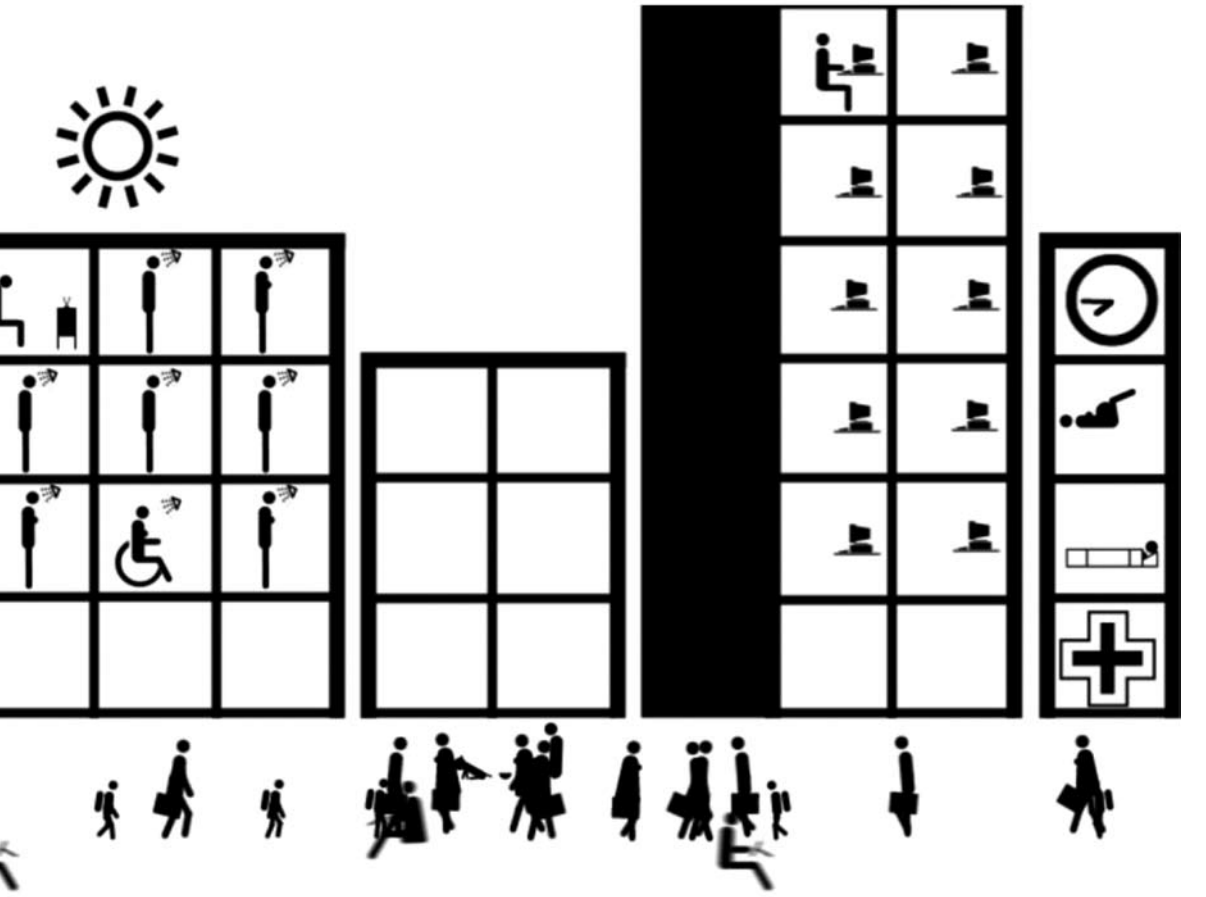
Creation *Pippo Lionni* 2002


Coca-Cola
Bristol City F.C.
TDK
board room
SAMSUNG
Budweiser
SANYO
GAP

London

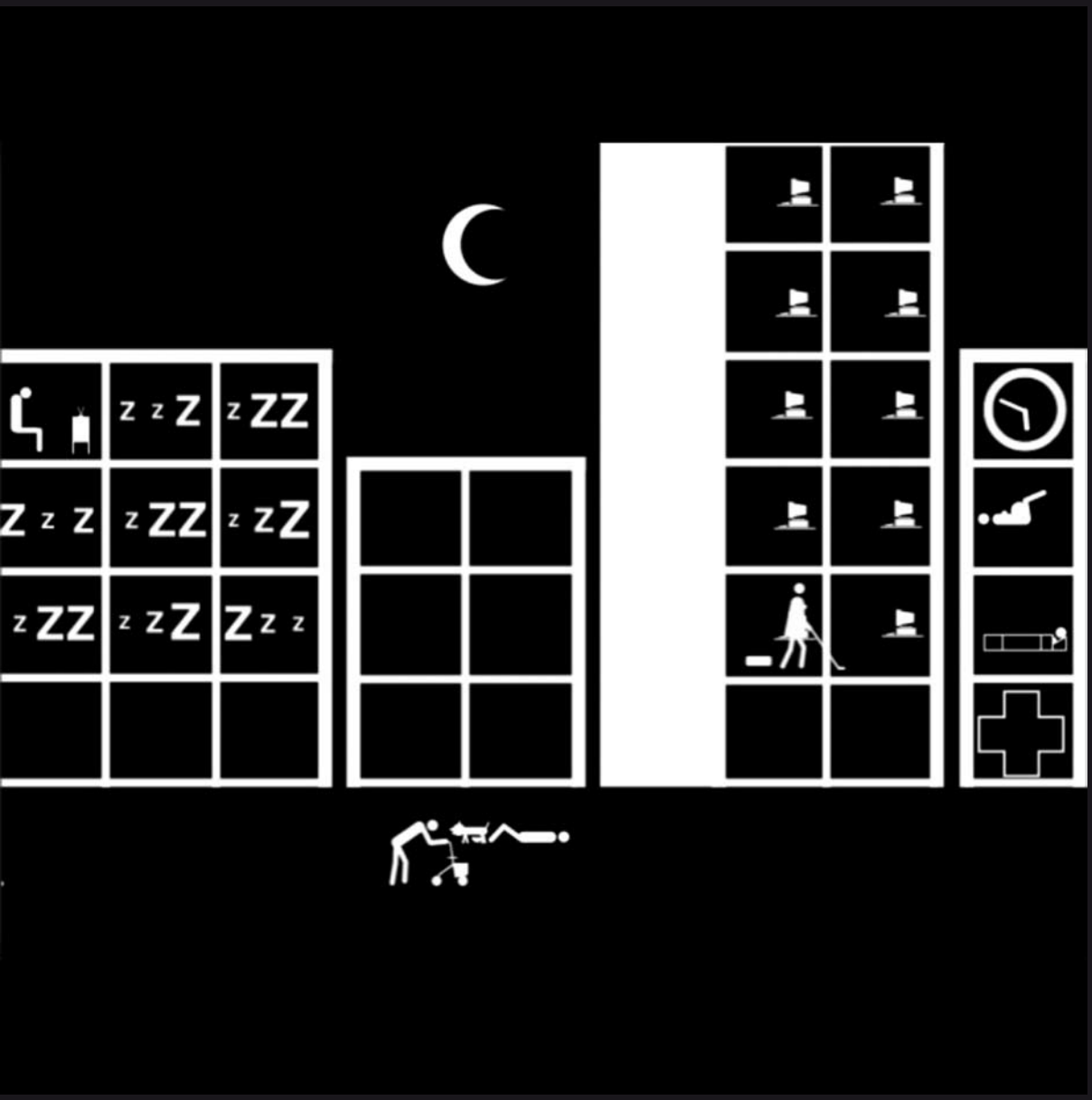

MEDIALAND
広告
3397-1777
Welcome!
to 秋葉原
AKIBA
DUTY FREE 免税店
MONSTER HUNTER 2 PORTABLE
燃やせ、狩魂!!
激安
HDD DVD レコーダー
テレビ 液晶
プラズマ
アダルトDVDソフト
ロケット1号店
冷蔵庫
洗濯機
エアコン
TAKARADA DUTY FREE 免税商店
Sony Overseas Models
CASIO CASIO CASIO
日通 警備

Tokyo



The Street *Lars Arrhenius* 2004 (animation film)

An animation, presenting a pictographic version of everyday events. Arrhenius' eye for the small absurdities of Western post-industrial civilization is akin to Jacques Tati's cinema. In Arrhenius' animations sound plays an important role too. The characters in this movie behave like the pictograms that represent them: in a two-dimensional way, following their daily routines with a remarkable civil obedience.

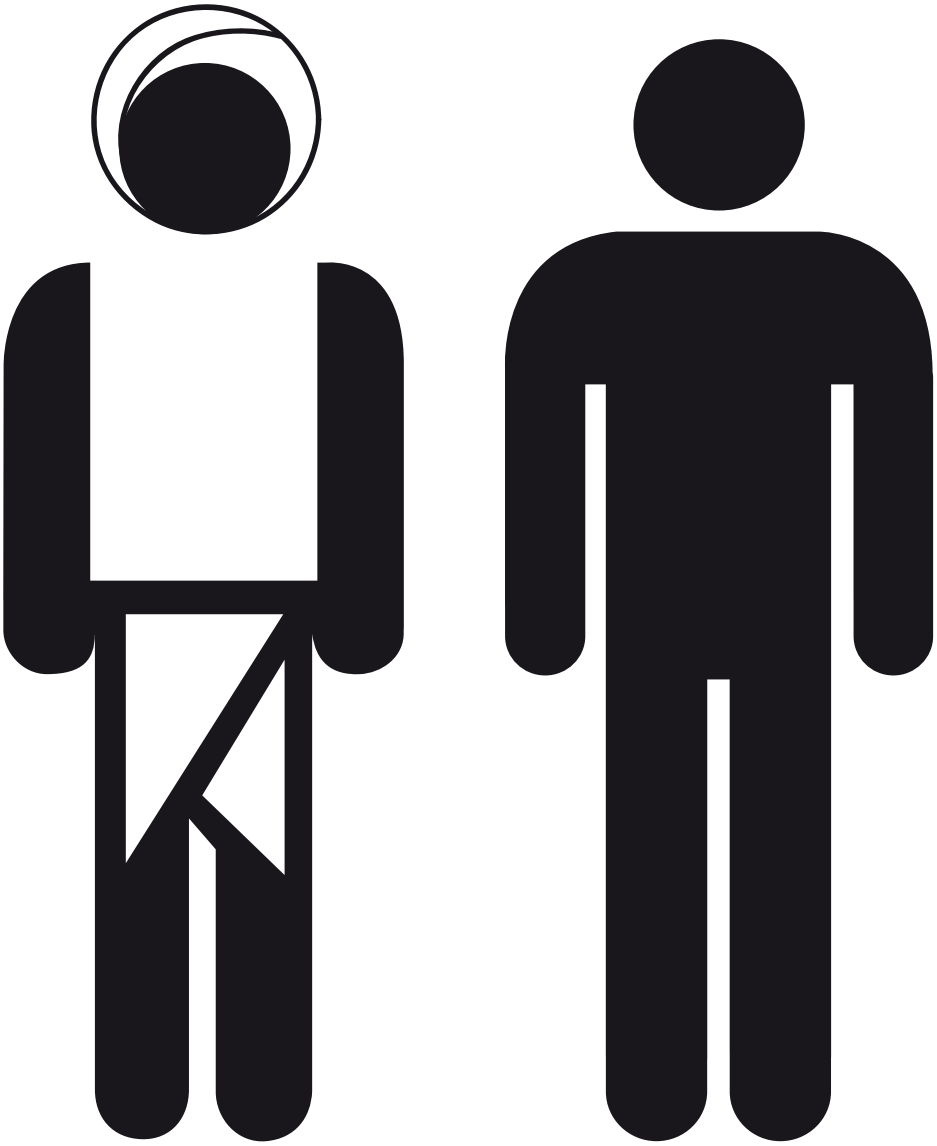




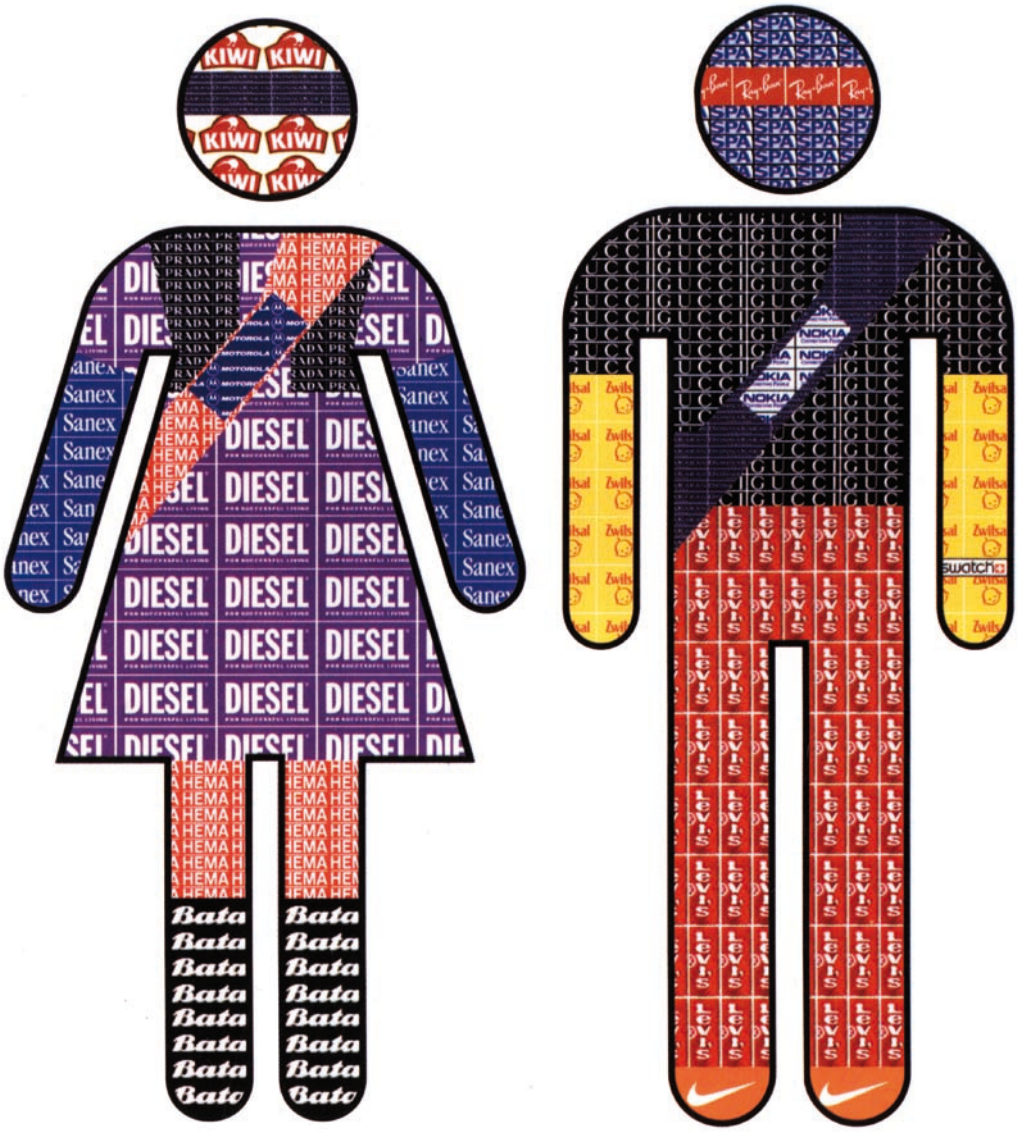
Corporate alphabet *Koert van Mensvoort, Arnoud van den Heuvel* 2007

An alphabet consisting of letters from well-known logos, which we recognize as part of our visual culture at a glance. That we can understand and explain all of these images is a miracle in the eyes of the makers of this alphabet. Our brains are filled with an unfathomable amount of images, which we can associate with each other or with abstract concepts to acquire new meaning. 'Man's visual potential is a 'Cabinet of Curiosities' in our heads.'


A
B
C
D
€
F
G
H
i
J
K
L
M
N
O
Q
R
S
T
V
W
X
Y
Z

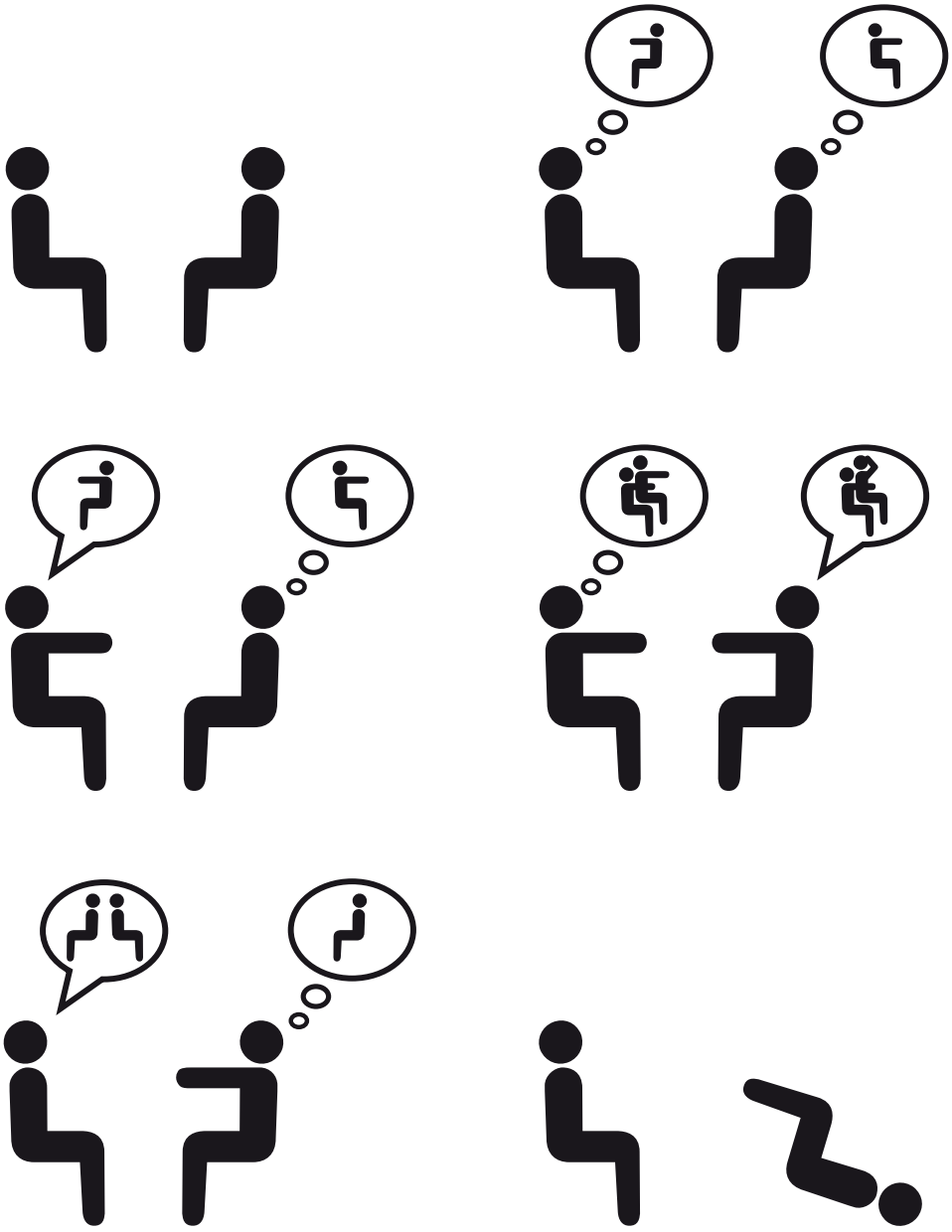


Left: Public information sign for toilet India *unknown designer and year*
Right: Public information sign for toilet USA *AIGA* 1974
The pictogram for man is meant as a neutral sign; it literally depicts a man without properties, without identifying details. You could also describe him as 'not a woman', because this is how he is most often used, as indication on the door of the men's room. Some people have a problem with this lack of detailing: the man is naked. In Sikh culture in India every man wears a turban and a loincloth. Depicted in this way, in this culture he is again a neutral symbol.



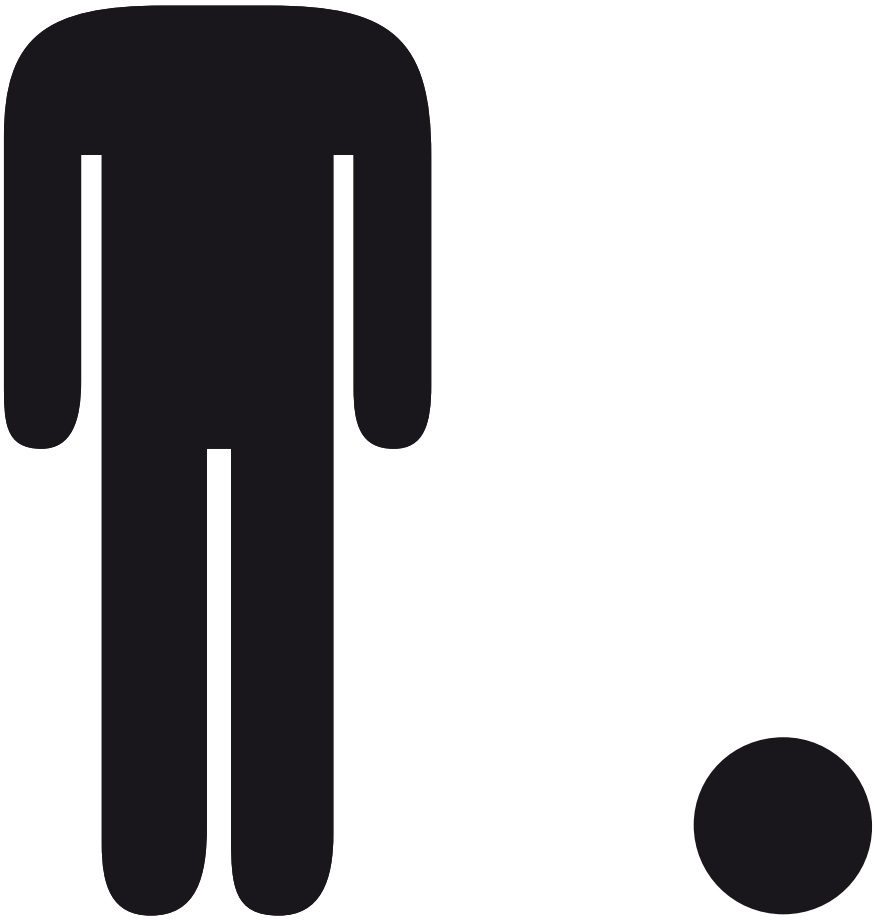
Label people *Mieke Gerritzen* 2000

Fashion labels are a safety skin, existential clothing in which attitude becomes cultural identity. Gerritzen charged the neutral symbols for man and woman into branded people, who borrow their identity from their clothes - a shield against insecurity and doubt. The universal symbols for man and woman become specific by the brands they are wearing.



Love story *Pippo Lionni* 2002

With no more than the simplest of pictograms, which he varies and arranges into small visual essays, designer Lionni comments on the world and 'the facts of life', as he titles his books. In this visual story, we see how two lovers think passed each other and, when insight strikes, can fall off their chair in surprise.



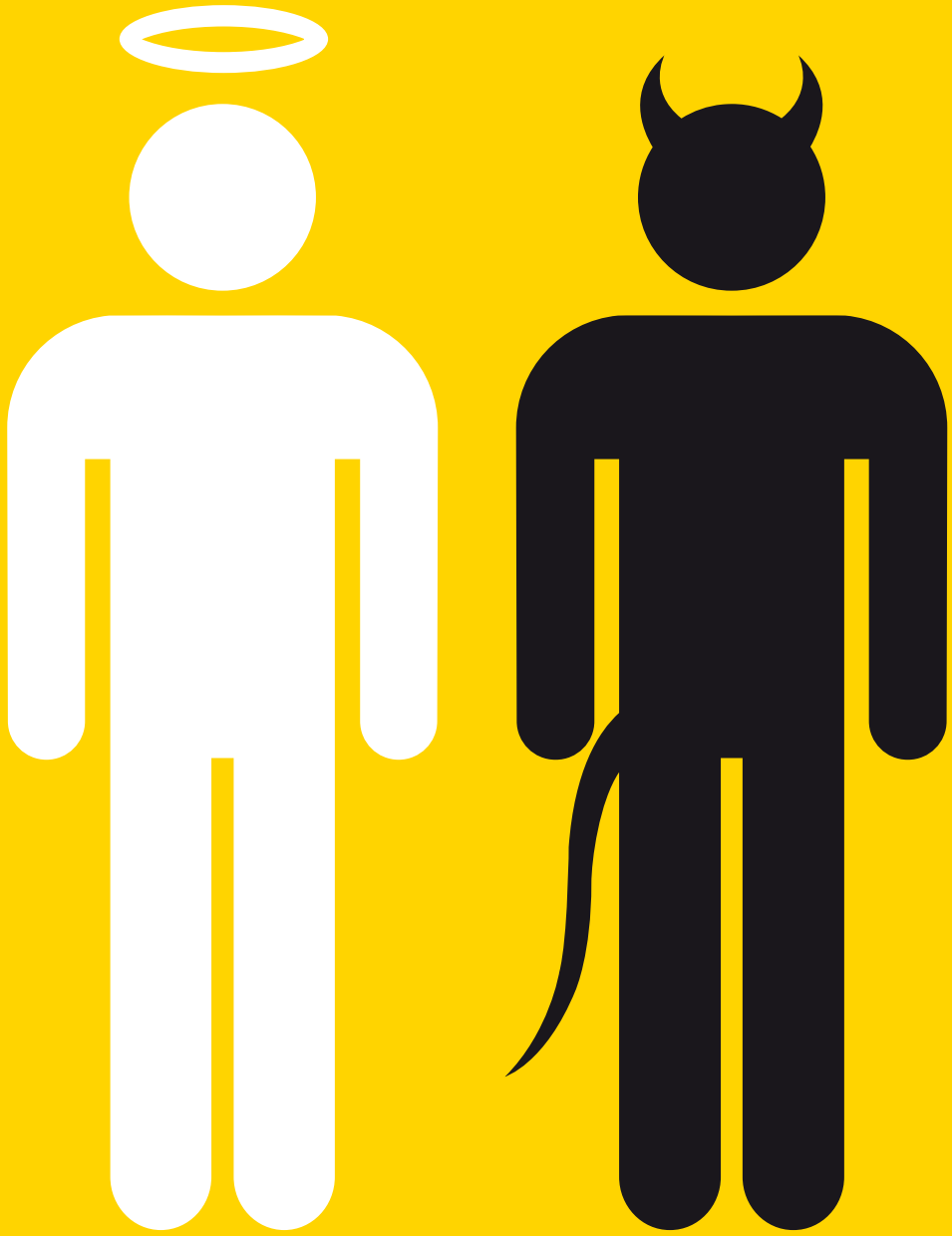
Mindless *Pippo Lionni* 2002

The title of this pictogram, which tells a crystal clear story with a tiny variation of the well-known icon man, is actually superfluous.



Poppi font *Martin Friedl* 2003

During a visit to Egypt Friedl saw ancient hieroglyphs in their original setting. He also witnessed how difficult it was to communicate with locals without a common alphabet. This dual experience led the young designer to an isotypical project: to develop a comprehensive imagebased language encompassing all areas of everyday life, allowing for communication beyond linguistic barriers.



Race signs *Chaz Maviyane-Davies* 2000

The universally recognizable 'toilet man' acquires a quite different meaning in this illustration for a South African magazine by the addition of two visual elements from Christian iconography. Now it not only states that black and white are separated, but also that one is the devil and the other a saint. In this way, the designer changes neutral information into a charged image of racial prejudice from a white perspective.

The Creation
Die Schöpfung
La création
La creazione
La creación

In the beginning God created heaven and earth.
Am Anfung schuf Gott Himmel und Erde.
Au commencement, Dieu créa les cieux et la terre.
Nel principio Dio creò i cieli e la terra.
En el principio creó Dios los Cielos y la tierra.

And the earth was without form and void
Und die Erde war wüst und leer,
Or la terre était vide et vague,
La terra era informe e vuota,
Y la tierra estaba desordenada y vacia

and the deep was covered in darkness
und es war finster in der Tiefe,
les ténèbres couvraient l'abîme
le tenebre coprivano la faccia dell'abisso
y las tinieblas estaban sobre la faz del abismo

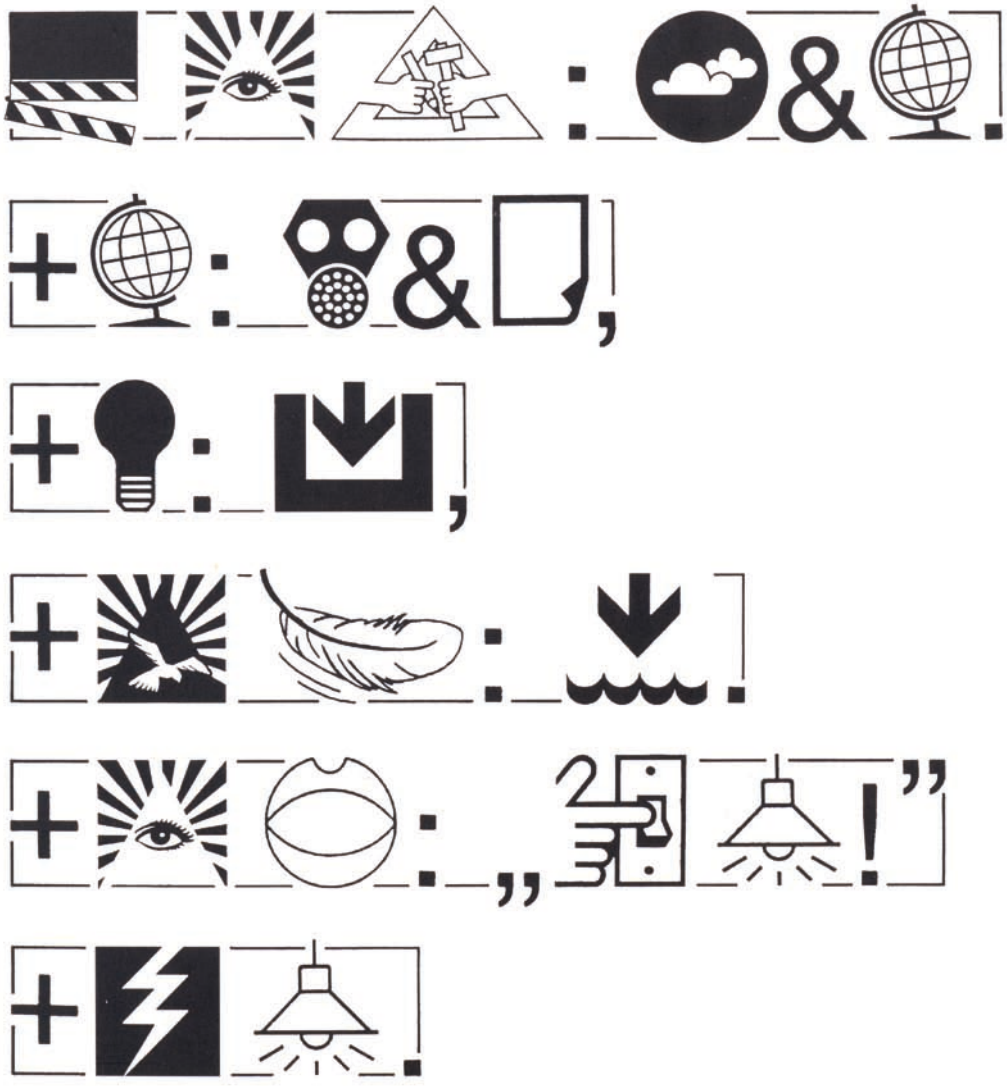
and the Spirit of God was hovering over the waters.
und der Geist Gottes schwebte auf dem Wasser.
un vent de Dieu tournoyait sur les eaux.
e lo Spirito di Dio aleggiava sulla superficie delle acque.
y el Espíritu de Dios flotaba sobre la faz de las aguas.

And God said, "Let there be light,"
Und Gott sprach: «Es werde Licht.»
Dieu dit: «Que la lumière soit.»
Dio disse: «Sia luce!»
Y dijo Dios: Sea la luz;

and there was light.
Und es ward Licht.
Et la lumière fut.
E luce fu.
y fue la luz.



Genesis *Juli Gudehus* 1997 (first and last page)
The story of creation from the first book of the Bible translated in five languages and in pictograms. Gudehus used internationally recognizable pictograms, but also well-known commercial logos to render flora and fauna. With that, her pictographical bible translation becomes a witty cultural critique as well: the animals and plants from brand logos are as 'natural' to us as God's creation.



And after the evening and morning there came the fifth day.
Da ward aus Abend und Morgen der fünfte Tag.
Il y eut un soir et il y eut un matin: cinquième jour.
Fu sera, poi fu mattina: quinto giorno.
Y fue la tarde y la mañana el dia quinto.

And God said, “Let the land produce living creatures.”
Und Gott sprach: «Die Erde bringe hervor lebendiges Getier.»
Dieu dit: «Que la terre produise des êtres vivants.»
Poi Dio disse: «Produca la terra animali viventi.»
Luego dijo Dios: Produzca la tierra seres vivientes.

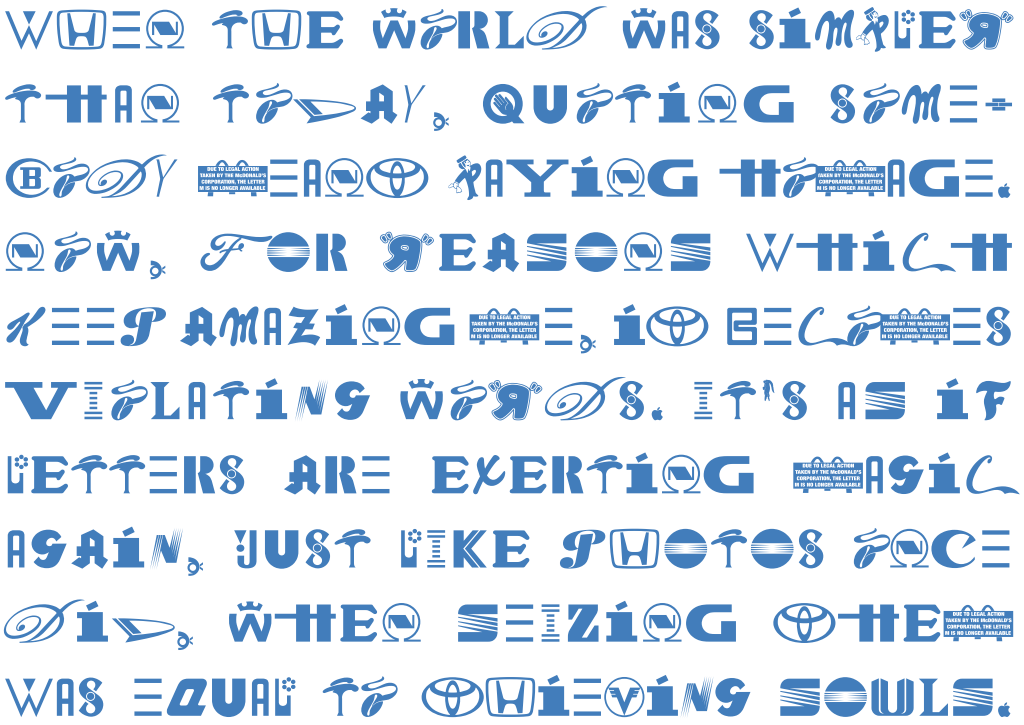
And it was so.
Und es geschah so.
Et it en fut ainsi.
E cosi fu.
Y fue asi.

God made the wild animals,
Und Gott machte die Tiere des Feldes
Dieu fit les bêtes sauvages selon leur espèce,
Dio fece gli animali selvatici della terra,
E hizo Dios animales de la tierra

the livestock and all the creatures that move along the ground according to their kinds.
und das Vieh und alles Gewürm, ein jedes nach seiner Art.
les bestiaux selon leur espèce et toutes les bestioles du sol selon leur espèce.
il bestiame e tutti i rettili della terra secondo le loro specie.
y ganado y todo animal que se arrastra sobre la tierra según su especie.

And God saw that it was good.
Und Gott sah, dass es gut war.
Et Dieu vit que cela était bon.
Dio vide che questo era buono.
Y vio Dios que era bueno.


5



Capitalis Pirata *Roland Henss* 1997

Logos are heavily guarded property, and if they consist of letters in a particular typography, like Coca Cola's, these letters represent the soul of the brand. Each letter in this text is owned by a company. The font was 'stolen' together by graphic designer Roland Henss, who was forbidden to use McDonalds' 'M'. Therefore, this letter is covered by a stern legal notice. The text, written by Max Bruinsma for this font, associates copyright infringement with ancient fears that taking a photo of someone meant stealing his soul.



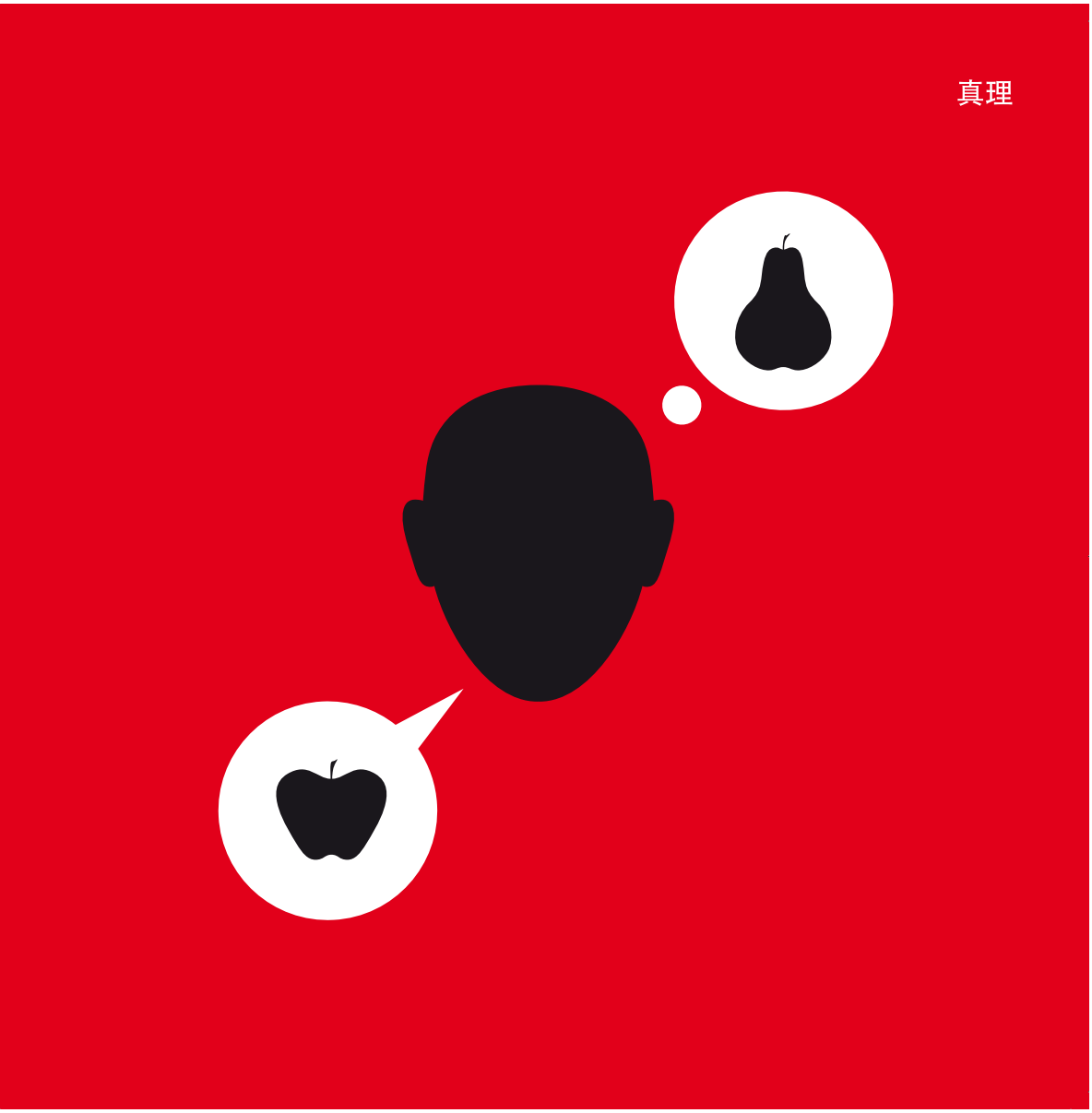
Embrace *Max Kisman* 2005

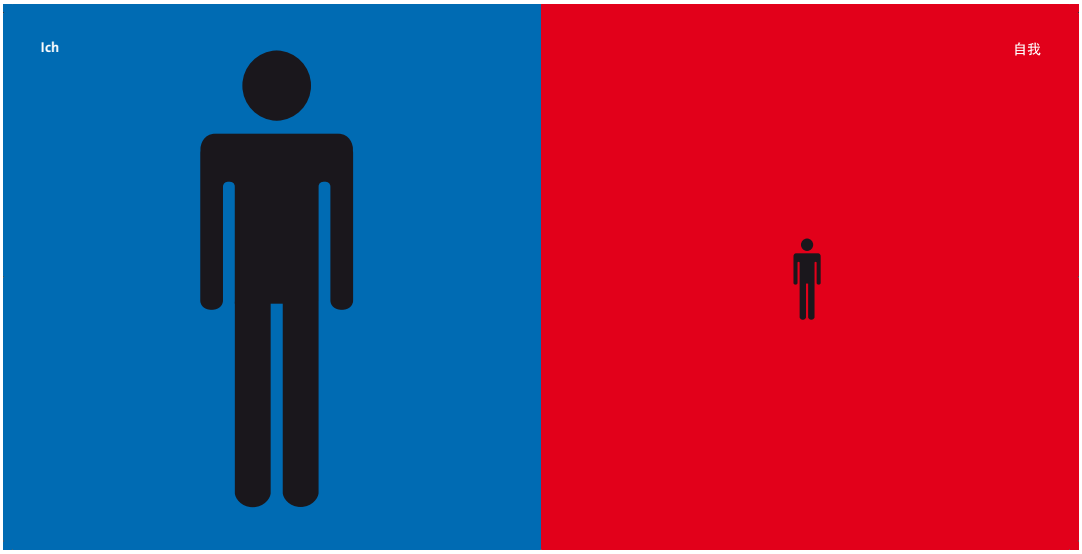
This image is actually unreadable without knowledge of the visual language of pictograms. Simply by outlining hands, legs, heads and breasts a remarkably detailed image is created of an intimate embrace, and the mirroring contours of nose, mouth and chin merge into an intense kiss. Just like Arntz did at the start of the previous century, Kisman uses the colour contrast to excite our visual imagination.

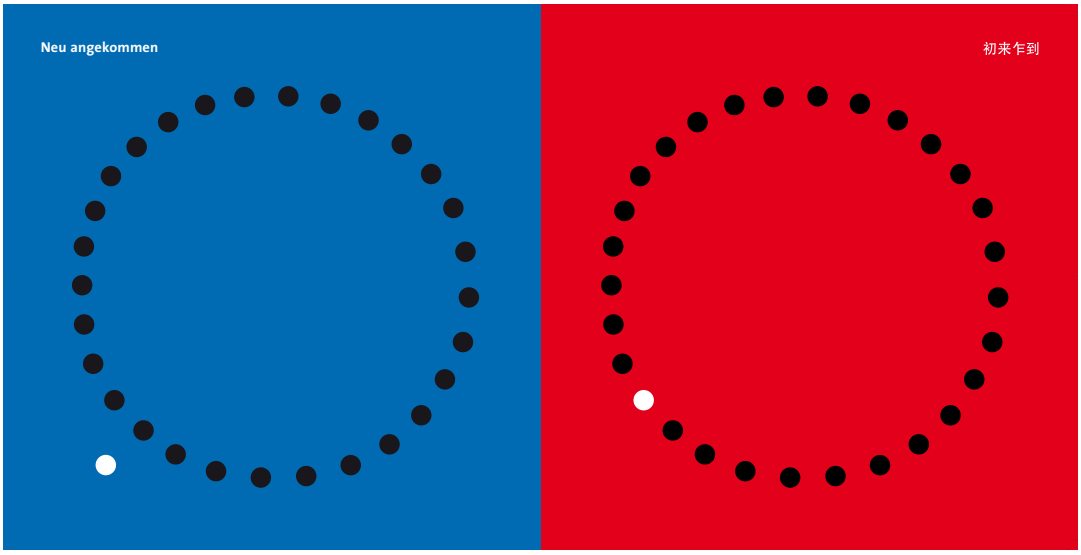


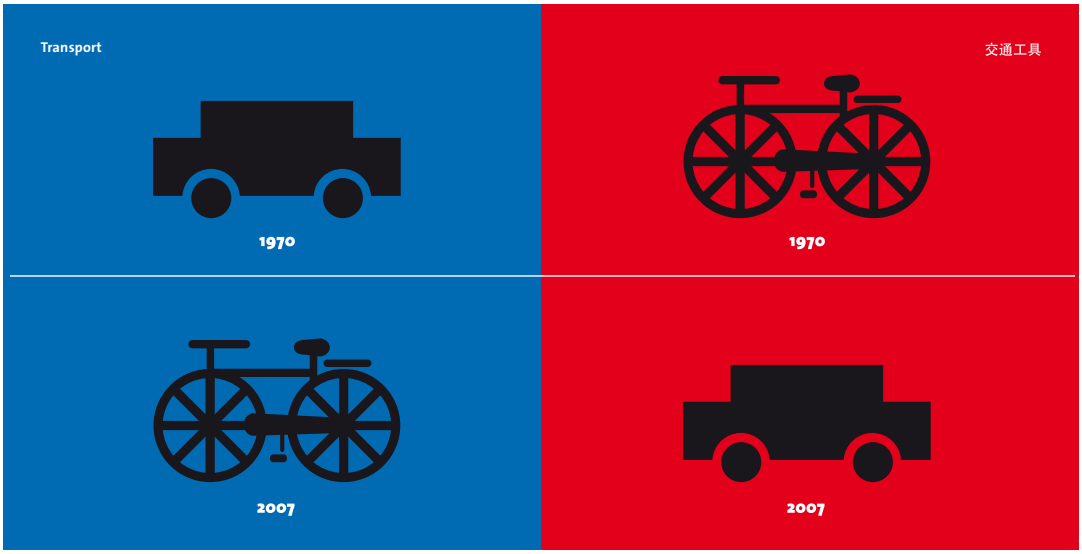
Ost trifft West *Yang Liu* 2007

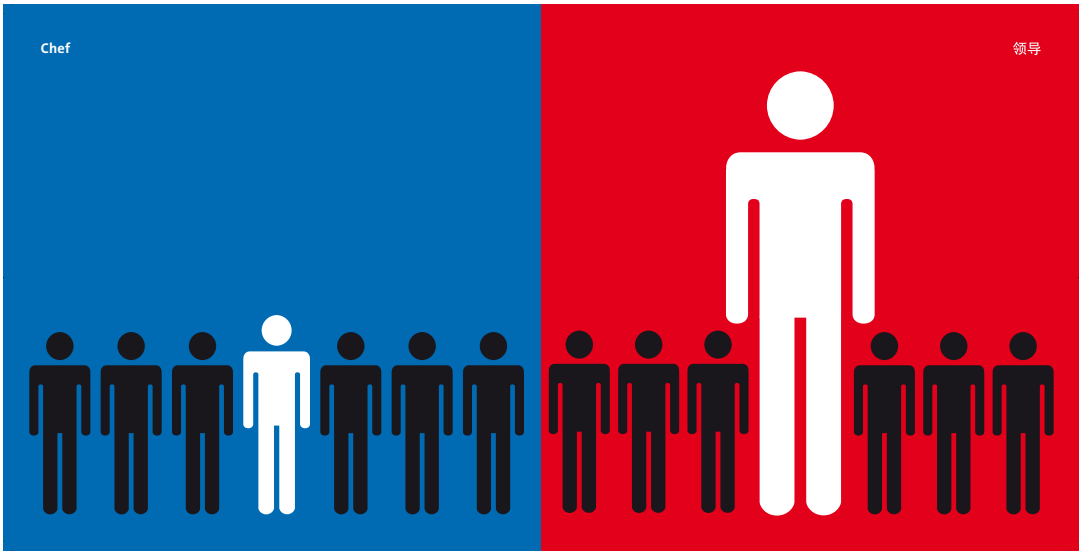
The Chinese-German designer Yang Liu used a pictographic visual language to compare and contrast the cultures of East and West. By slightly but significantly varying one or a few elements in pairs of images, the designer succeeds in conjuring up fundamental differences between how people experience the world in the two cultures, China and Europe. We say what we think, but a Chinese may say 'apple' and think 'pear'. According to the caption 'Wahrheit' (truth), for Liu this does not necessarily imply that the Chinese are lying, but that our concepts of truth differ.

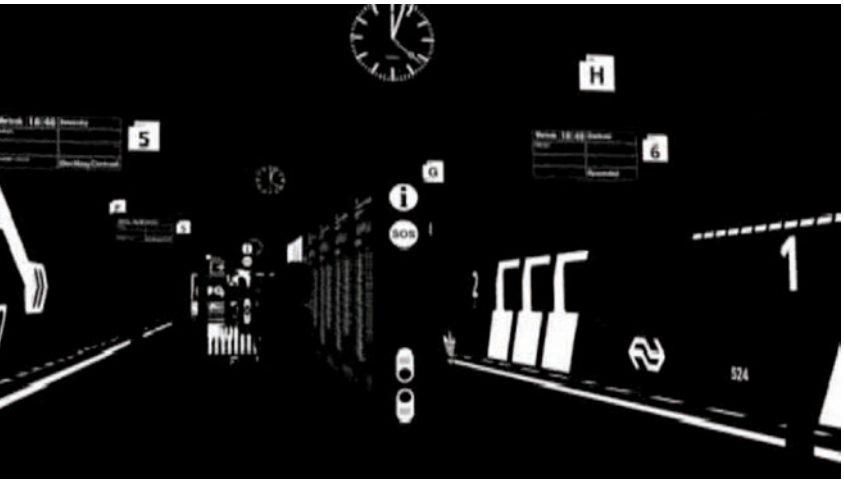

真理


Ich
自我


Neu angekommen
初来乍到


Transport
1970
2007
交通工具
1970
2007

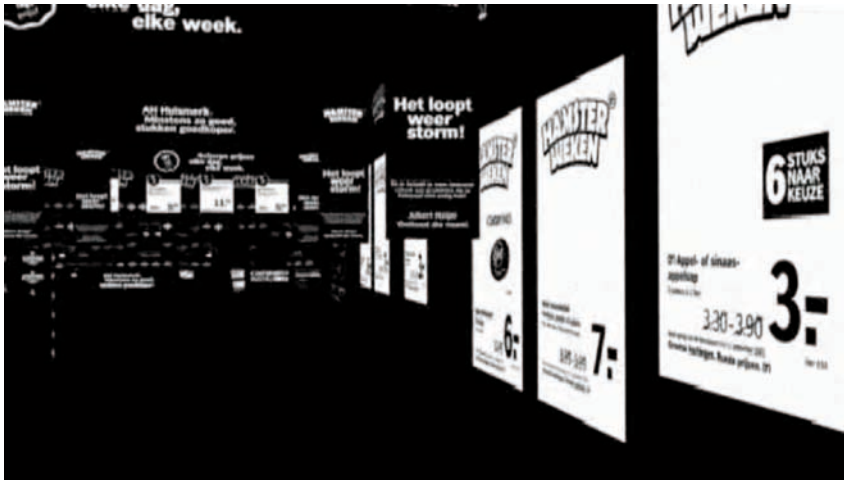

Chef
领导

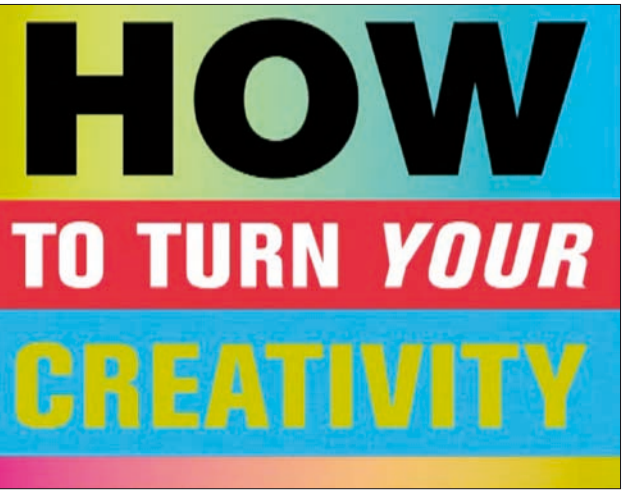




Kapitaal *Ton Meijdam, Thom Snels, Béla Zsigmond* 2003 (typographic film)
This animated film shows to what extent our urban environment is defined by graphic signs, typographies and icons. In this walk through Breda's inner city, everything that is not a sign is blackened out. Still, the city remains recognizable. An incisive commentary on how the signs of 'capital' describe our environment.


Orange
Orange
SIM-ON
ACTI
€3.99


elke week.
Het loopt weer storm!
6 STUKS NAAR KEUZE
3.-
3.30-3.90
7.-
6.-





Beautiful World *Mieke Gerritzen* 2006 (typo film)

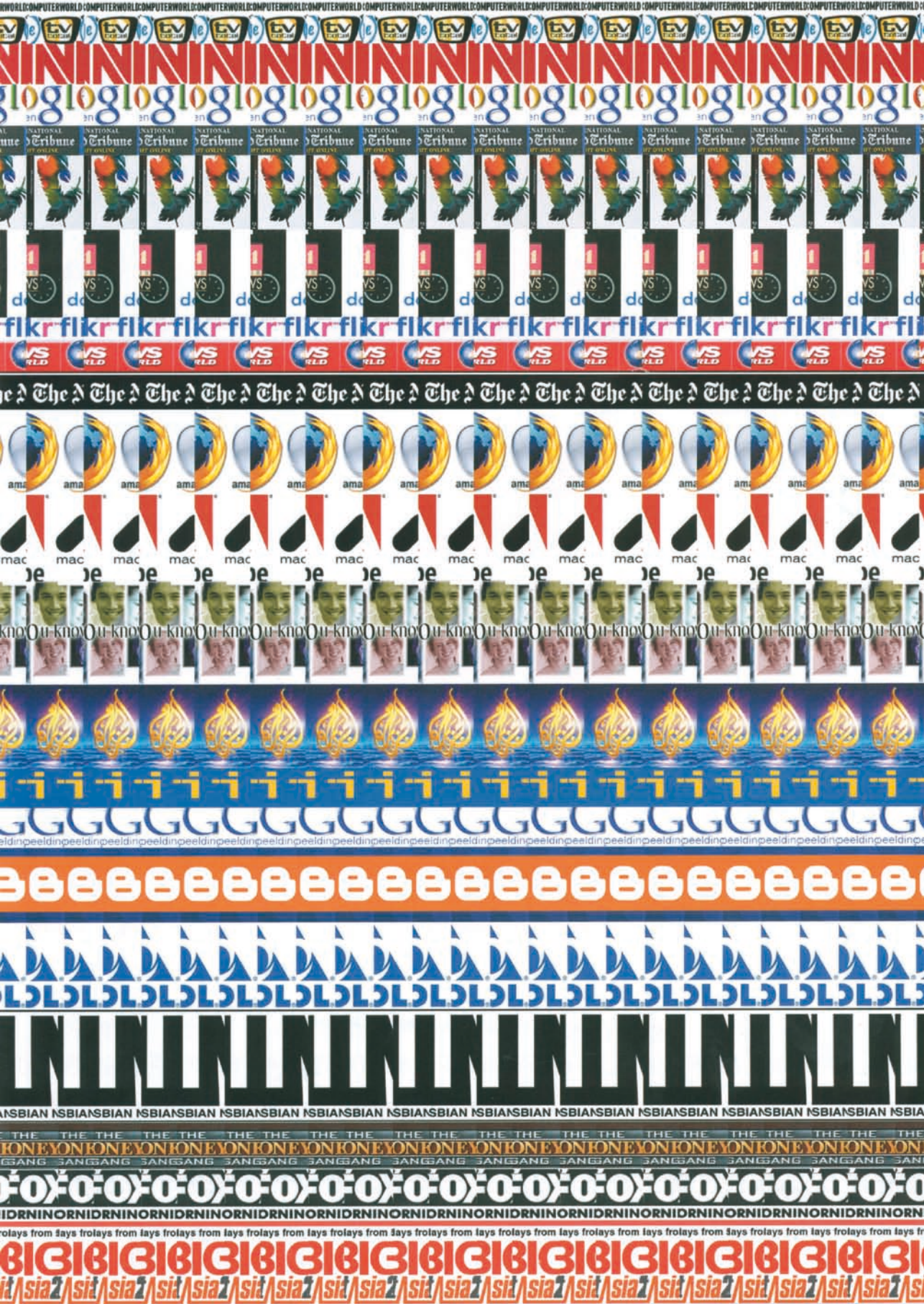
This film is about the visual language of signs, codes and trends. It contains texts only, which become image by virtue of the typography: quotes by well-known and lesser-known thinkers who are shaping our view of the world. It tells about globalization and shows that the world is dumbing down because practically everything has become linked to economic interests. A film to read or typography to look at.





Next page: fragments from Beautiful World.




COMPUTERWORLD
flickr
The
mac
know
peeling
ASIA
ONE
GANG
from days


you
me



People *Charles Sandison* 2003 (random projection)
The Finish artist Sandison answers the growing visual culture, which seems to engulf the culture of words, by turning the tide: in his work, images become words again. In dynamic installations, he projects strings of words onto spaces, which thereby literally become described. On the other hand, these pulsating words thread together in the eye of the beholder to become an image again. A provisional end point of information culture: word and image merging seamlessly.



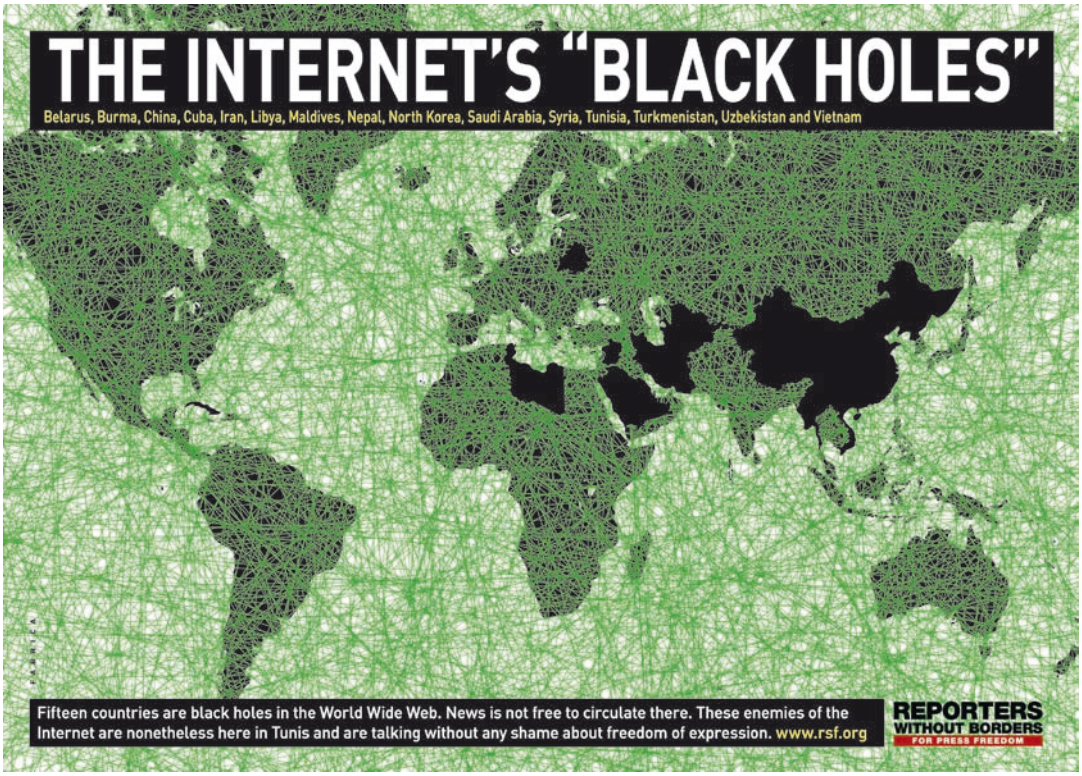
Fabrica

Fabrica is the visual research & development lab of the Italian clothing brand Benetton. Initiated in 1994 by the company's owner, Luciano Benetton, and his controversial art director, Oliviero Toscani, the lab not only develops new campaigns for Benetton and for non-profit organizations such as Amnesty International, but also researches today's visual culture in experimental projects and publications. Each year, a number of young and talented designers are invited to spend a period of time at Fabrica's austere building near Venice, designed by the Japanese architect Tadao Ando. On the following pages are some experimental works by Fabrica participants, who use the icons and signs of today's commercial visual languages to critically comment on that same culture.



Chokolate *Frederico Duarte* (from: Diversity, Fabrica, 2005)





The internet's 'Black holes' *Fabrica* 2005

The whole world is meanwhile connected by an intricate network of internet connections, which allows us to communicate freely and globally. But in a few places this free exchange is blocked by the government, for instance in Tunisia. The organization 'Reporters without borders' was of course infuriated when here of all places a UN conference on the Information Society was held. To protest, they commissioned this world map.

Way out *Andreas Rød Skilhagen* (from: Diversity, Fabrica, 2005)

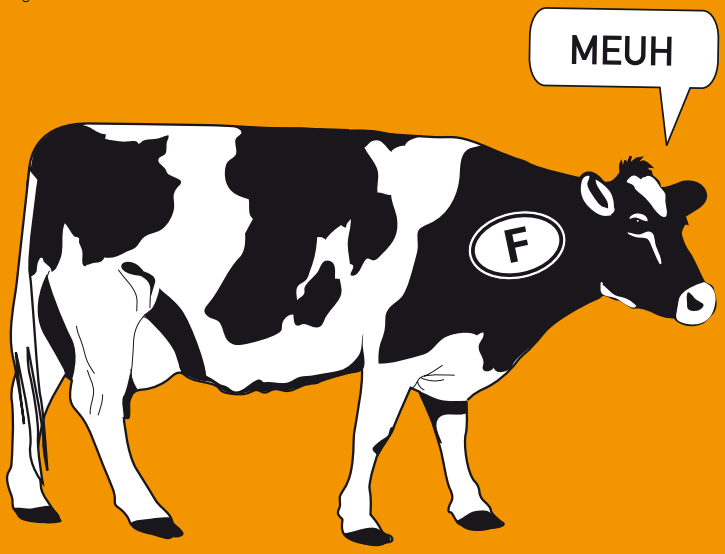


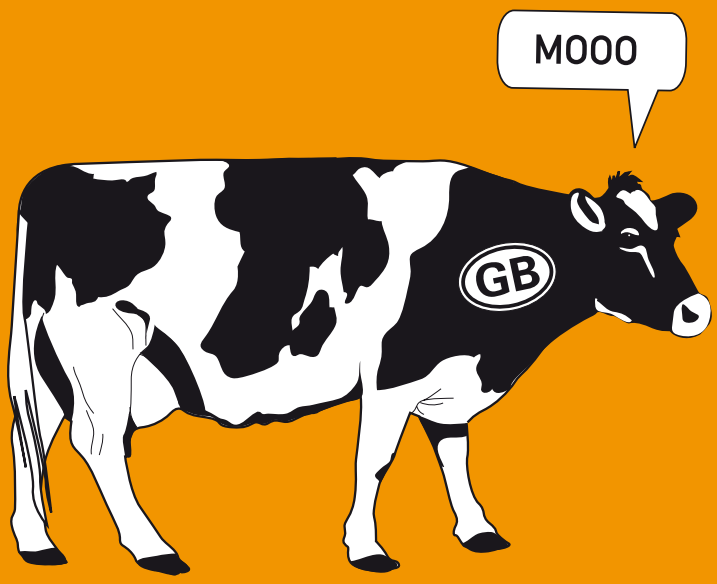


WC *Gabriele Riva* (from: Wanted Creativity, Fabrica, 2003)

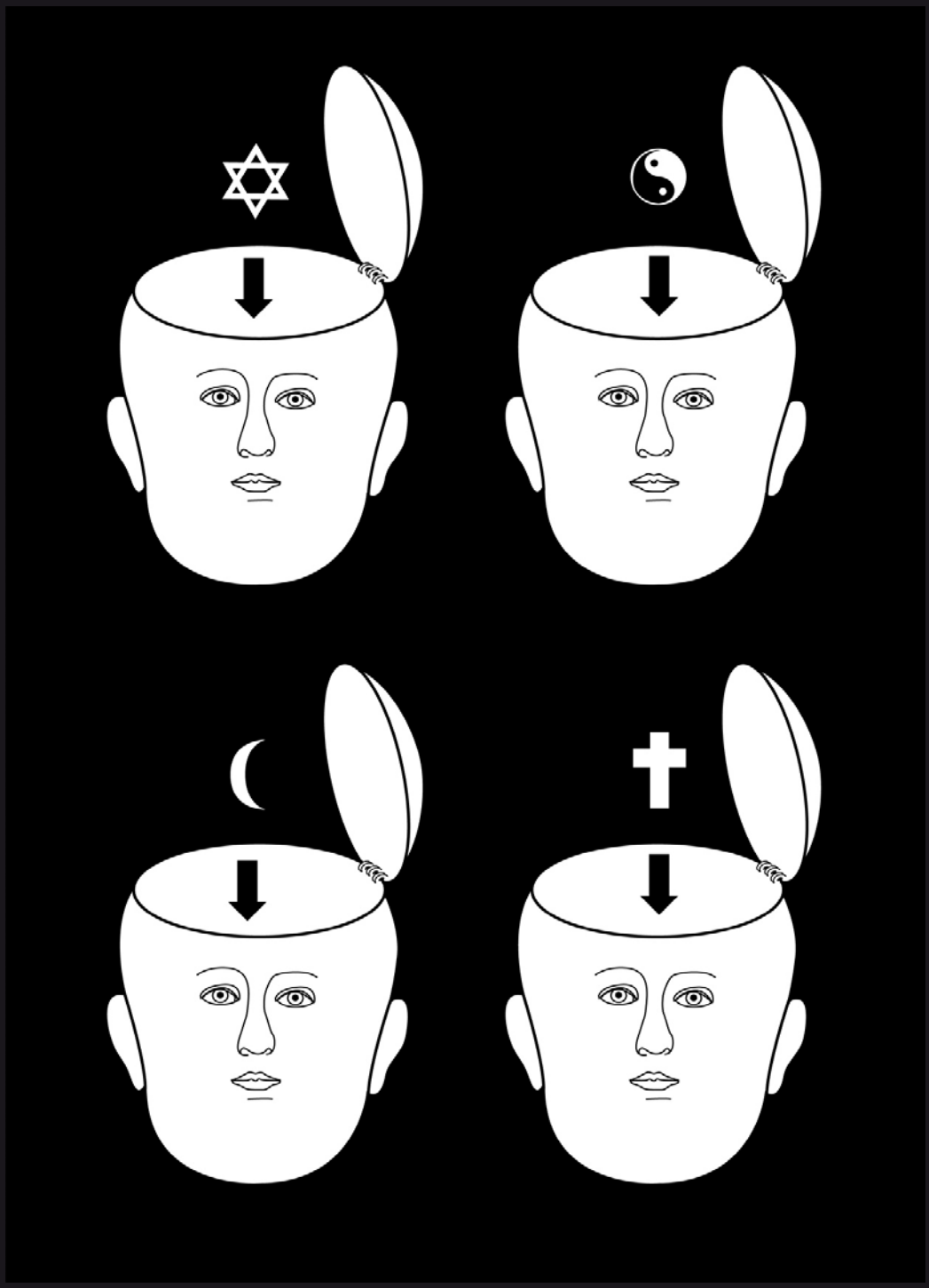
By symbolizing the fast food and long drink character of design as 'WC', using fragments from the McDonalds' and Coca Cola logos, the designer simultaneously summarizes his critique and playfully calls for a change for the better: Wanted, creativity!







Language differences *Francois Prost* (from: Diversity, Fabrica, 2005)



Religions *Francois Prost* (from: Diversity, Fabrica, 2005)



Faces *Paolo Palma* (from: Wanted Creativity, Fabrica, 2000)

The various versions of Paolo Palma's face - his 'facial designs' - confront us with our own preferences and preconceptions. We immediately interpret faces as sympathetic or unappealing, beautiful or dull, dumb or intriguing. We project characters and contexts onto faces, and pretend to instinctively 'know' who the person connected to a face is. Artists or worker? Petit bourgeois or terrorist? Liberal or orthodox? One face can have many expressions, which are all readable as clearly as pictograms are. In that sense, a face is as much information design as it is the expression of a personality.





Exhibition

The exhibition Lovely Language - words divide, images unite was shown at the Centraal Museum Utrecht, The Netherlands, from November 25th, 2007, till February 10th, 2008. The images on the following pages give an overview of the exhibition.


OTTO NEURATH
1880-1945



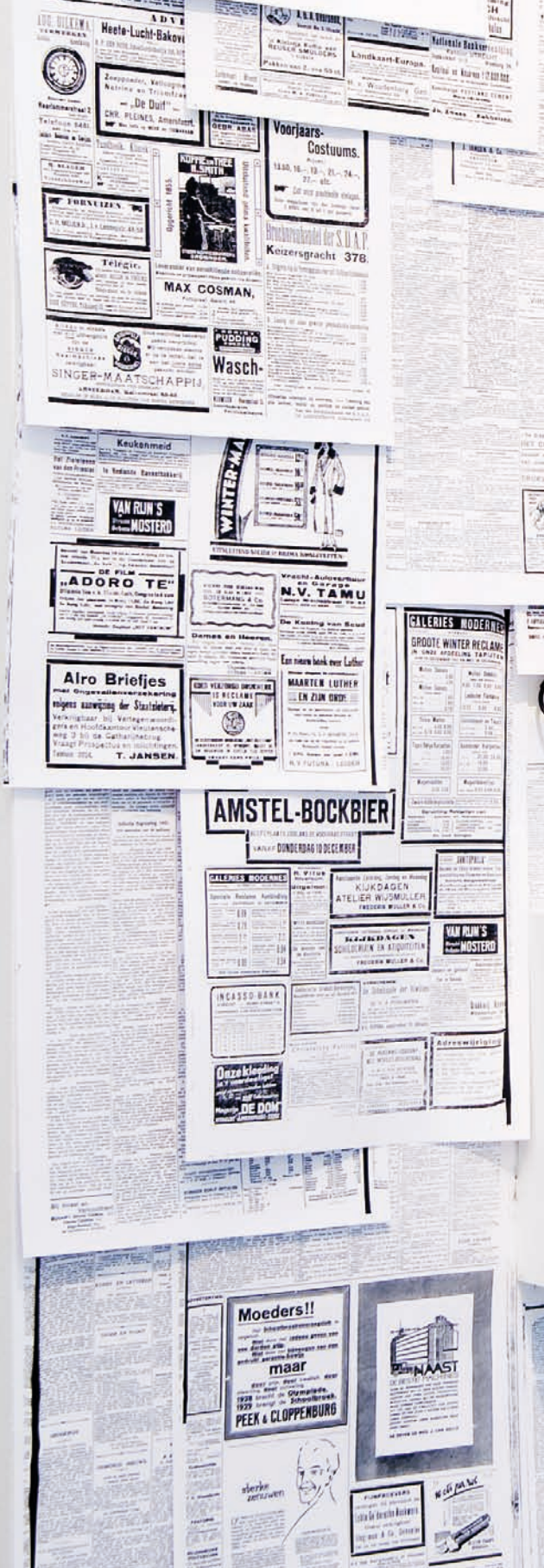
Left: the scientist Otto Neurath.
Right: the artist and graphic designer Gerd Arntz.
Centre: the visual language Isotype Arntz and Neurath developed together.

over elk onderwerp dat hem
it landkaarten en atlassen.

about all subjects in which he
maps and atlases.

OTTO NEURATH






DADA MATINEE
SALON DOELE
Beelden zijn een attractie.
Pictures are an attraction.
ABDULLA
CIGARETTES
FRANKFURTER JAARBEURS
29 MAART – 4 APRIL 1925
RADIO
MOBILISATIE
KWATTA'S MANOEUVRE CHOCOLAAD
Ik ben kruidenier
SUNLIGHT ZEEP
Maatkleeding
Dijckhoff
Odol
GOLDEN



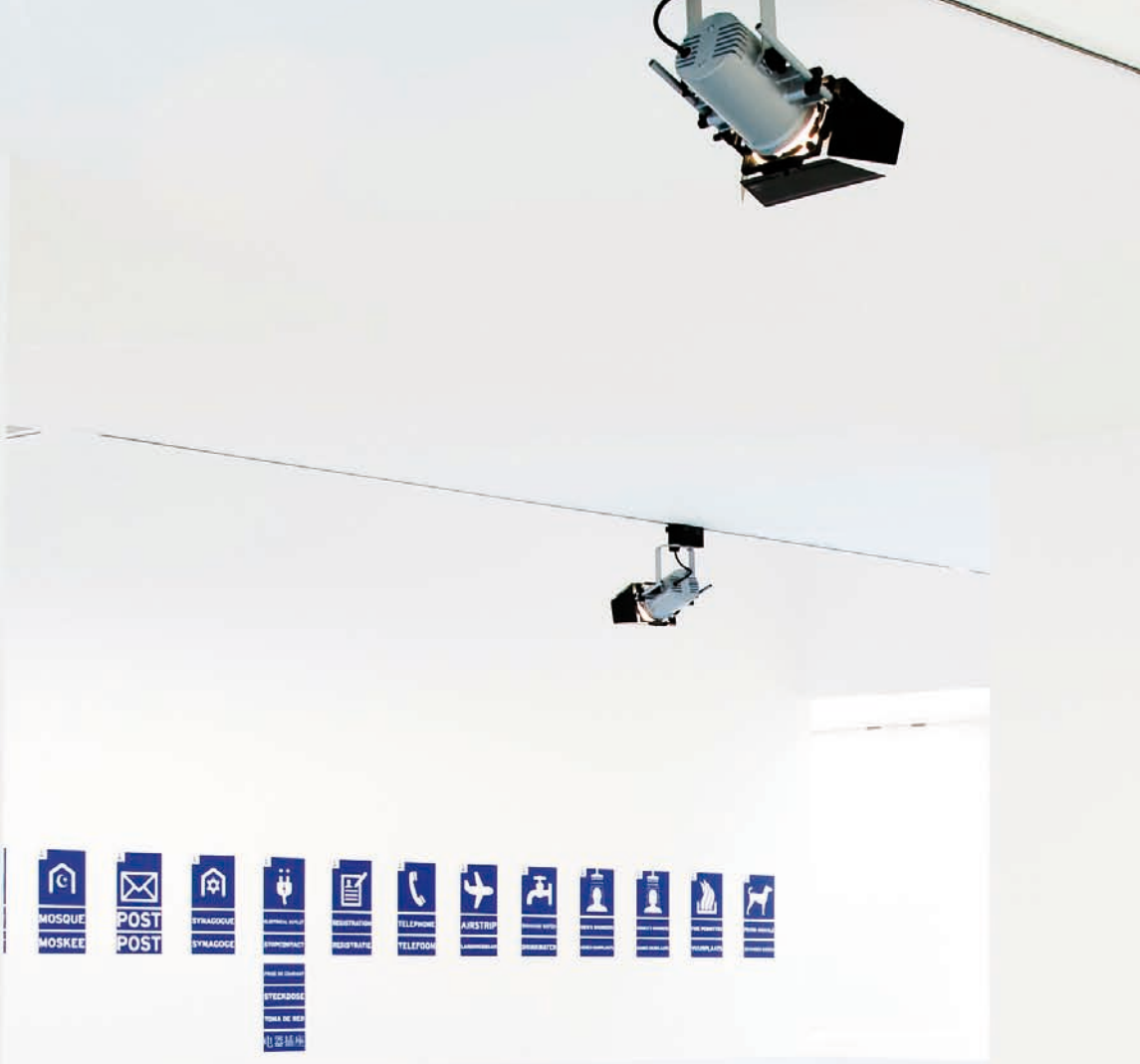
The colourful wallpapers left and right can be read as a diagram of an accelerating and thickening information culture; the nearer to our own time, the more detailed this barcode of history becomes.




SAFETY ON BOARD
SAFETY ON BOARD



Two-dimensional user manuals and spatial human models which explain how our body functions.



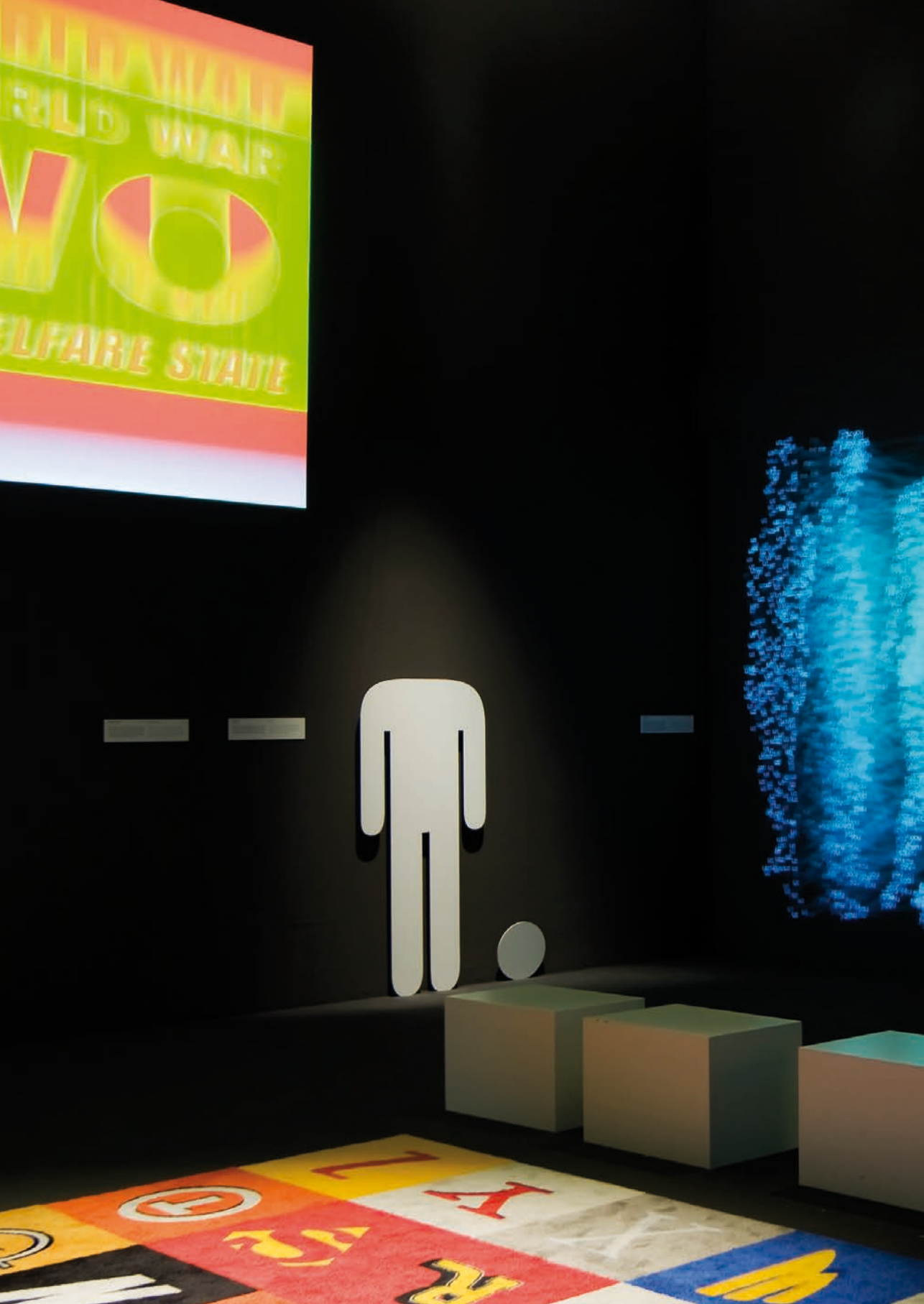
Exhibition A Safe Place from
Gert and Derk Dumbar.

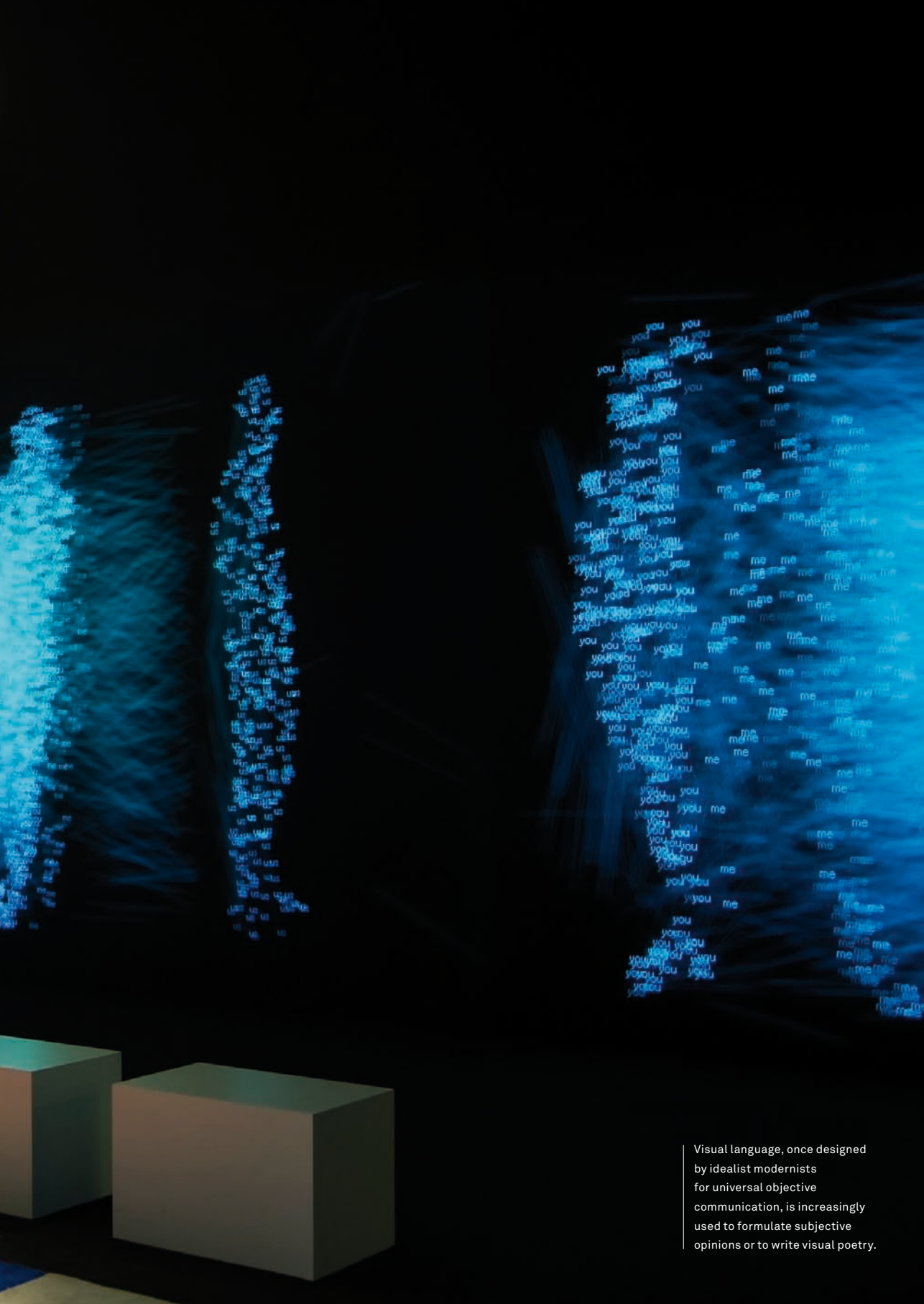

LAUNDRY FACILITIES
WASPLAATS
COOKING AREA
KOOKPLAATS
MOBILE NETWORK
MOBIEL NETWERK
SLEEPING AREA
SLAAPPLAATS
FOOD
VOEDSEL
P
PARKING
PARKEREN
CHURCH
KERK
PET CEMETE
BEGRAAFPLA
DIEREN



A great variety of 'visual dialects': glasses that all say 'fragile' and umbrellas to keep packages dry.


TROUBLES:

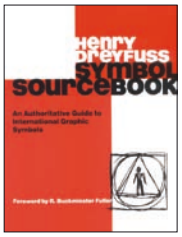

RLD WAR
VO
ELFARE STATE



Visual language, once designed by idealist modernists for universal objective communication, is increasingly used to formulate subjective opinions or to write visual poetry.

Personalize this book

Since this book is about visual language and how this language has become not only legible as information tool for people around the world, but also a means of expression in which one can ‘write’ one’s own views, we provide space for the reader, here. For your notes and remarks, but also your own visual vernacular.
If you want to share your views in verbal or pictorial language with the editors of this book, please scan them and send them to:
editors@culturecatalysts.org





Literature

Listed here is a selection of books concerning pictogram design and the visual culture of information design, which have guided the research for Lovely Language. Regrettably, most of the books on Neurath and Arntz are out of print, but you may find them in specialized libraries, antiquarian and used books shops.

Rayan Abdullah, Roger Hübner, ‘Pictograms, icons and signs, a guide to information graphics’, 2006
ISBN 978 0 500 28635 7, Thames and Hudson, London

Marion Ackermann, ‘Piktogramme - Die Einsamkeit der Zeichen’, 2006
ISBN 978 3422066748, Deutscher Kunstverlag, München/Berlin

Otl Aicher, Martin Krampen, ‘Zeichensysteme der visuellen Kommunikation: Handbuch für Designer, Architekten, Planer, Organisatoren’, 1977
ISBN 978 3874225656, Alexander Koch

Erwin K. Bauer, Frank Hartmann, ‘Bildersprache, Otto Neurath Visualisierungen’, 2006
ISBN 978 3708900001, WUV Universitätsverlag, Vienna

Uli Bohnen, Kees Vollemans, ‘Gerd Arntz: Politieke prenten tussen twee oorlogen’, 1973
ISBN 90 6168 063 8, SUN Nijmegen

Flip Bool, Kees Broos, ‘Gerd Arntz, Kritische grafiek en beeldstatistiek’, 1976
ISBN 978 9061681137, Gemeentemuseum The Hague, The Hague

Kees Broos, ‘Gerd Arntz: De tijd onder het mes: hout en linoleumsneden 1920 - 1970’, 1988
ISBN 9061682908, SUN Nijmegen

Kees Broos, ‘Symbolen voor onderwijs en statistiek: 1928-1965 Wenen-Moskou-Den Haag’, 1979
ISBN 90 70115 08 5, Mart Spruijt, Amsterdam

Hartmut Brückner, ‘Designing Information’, 2004
ISBN 978 3897572232, Hauschild, Bremen

Colors magazine, ‘1000 Signs’, 2004
ISBN 3 8228 3135 2, Taschen, Cologne

Henry Dreyfuss, ‘Symbol Sourcebook’, 1972
ISBN 0 442 21806 0, Van Nostrand Reinhold, New York

Michael Evamy, ‘World Without Words’, 2003
ISBN 0 8230 5934 0, Watson-Guptill Publications, New York

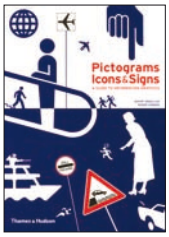
Fabrica, ‘Fabrica 10, From Chaos to Order and Back’, 2004
ISBN 978 883703011, Electa, Milan

Nigel Holmes, ‘Designer’s guide to creating charts and diagrams’, 1984
ISBN 0 8230 1315 4, Watson-Guptill Publications, New York

Pippo Lionni, ‘Facts of life 2’, 2001
ISBN 978 1856692564, Laurence King Publishing, London

Yang Liu, ‘Ost Trifft West’, 2007
ISBN 978 3 87439 733 9, Verlag Hermann Schmidt Mainz, Mainz

Otto Neurath, ‘Modern man in the making’, 1939
Knopf, New York






Otto Neurath, ‘Gesellschaft und Wirtschaft’, 1930
Bibliographisches Institut ag, Leipzig

Ferdinand Mertens, ‘Otto Neurath, en de maakbaarheid van de betere samenleving’, The Hague, 2007
ISBN 978 90 5260 262 2, Aksant, Amsterdam, Sociaal Cultureel Planbureau, The Hague

Paul Mijksenaar, ‘De vorm zal u toegeworpen worden’, 1996
ISBN 90 6450 224 2, Uitgeverij 010, Rotterdam

Paul Mijksenaar, Piet Westendorp, ‘Open here, The art of instructional design‘, 1999
ISBN 978 1556709623, Joost Elffers Books, New York

Otto Neurath, ‘Basic by ISOTYPE’, 1937
Kegan Paul, Trench, Trubner & Co, London

Otto Neurath, ‘International picture language, the first rules of Isotype’, 1936
Kegan Paul, Trench, Trubner & Co, London

Otto Neurath, ‘Modern man in the making’, 1939, Knopf, New York

Otto Neurath, ‘Gesellschaft und Wirtschaft’, 1930, Leipzig

Edward Tufte, ‘The Visual Display of Quantitative Information’, 2001
ISBN 978 0961392147, Graphics Press, Connecticut

Michael Twyman, ‘Graphic communication through ISOTYPE’, 1975
ISBN 978 0704901471, University of Reading

www.affichemuseum.nl
www.aiga.com
www.annelysdevet.nl
www.arnoudvandenheuvel.nl
www.edwardtufte.com
www.fabrica.it
www.flickr.com
www.geheugenvannederland.nl
www.gerdarntz.org
www.informationdesign.org
www.infosthetics.com
www.integral.ruedi-baur.com
www.kare.com
www.koert.com
www.lionni.com
www.maxbruinsma.nl
www.maxkisman.com
www.mijksenaar.com
www.museumdebeyerd.nl
www.nigelholmes.com
www.olympic-museum.de
www.ontwerpwerk.nl
www.sandberg.nl
www.spiekermann.com
www.understandingusa.com
www.visualcomplexity.com

Photocredits

All pictograms of umbrellas shown in this book come from 'Die Hieroglyphen von Heute', Hans-Rudolf Lutz, 1997.
The Isotypes from Gerd Arntz (pages 67-68) are digitally redrawn by Ontwerpwerk.

Page 13; Photo by Robaard/Theuwkens
Page 33; Collection Kunstmuseum Basel
Page 35; Illustration scanned from the 'Symbol Sourcebook', Henry Dreyfuss, 1972
Page 48; Collection Archive Amsterdam
Page 49; Collection Archive Engelfriet www.engelfriet.net
Page 51; Collection Archive Rotterdam
Page 52; Collection Archive ANWB
Page 53; Collection Koninklijke Bibliotheek, The Hague, kranten.kb.nl
Page 59; Scanned from 'The Visual Display of Quantitative Information', Edward Tufte, 2001 (collection Bibliothèque de l'École Nationale des Ponts et Chausées, Paris)
Page 61; Illustration redrawn from 'International Picture Language', Otto Neurath, 1936
Pages 64, 95-113, 157; Scans from 'Gesellschaft und Wirtschaft', Otto Neurath, 1930, collection Gemeentemuseum The Hague
Pages 76, 79, 80, 86; Collection Peter Arntz
Page 89; Scanned from 'Gerd Arntz, De tijd onder het mes', 1988
Pages 90, 91; Collection Gemeentemuseum The Hague, photos by Max Bruinsma
Page 135; Illustration scanned from 'Pictogram Design', Yukio Ota, 1987
Page 159; Illustration scanned from 'Designer's guide to creating charts and diagrams', Nigel Holmes, 1984
Page 167; Photo by Max Bruinsma
Page 172, 173; Infographics scanned from newspapers from the Foundation Archive Paul Mijksenaar
Pages 176-178, 180; ©1976 by ERCO Leuchten GmbH
Pages 179, 181; Collection International Olympic Committee
Pages 188, 189; Photo by Mijksenaar
Page 220; Illustration redrawn from 'World Without Words', Michael Evamy, 2003
Page 214; Photo by Wallyg from www.flickr.com
Page 215; Photo by Cunaldo from www.flickr.com
Pages 240, 241; Illustration scanned from the invitation for the screening of 'Beautiful World' in the Stedelijk Museum, Amsterdam, 2006
Pages 242, 243, 258-271; Photos by Roel Stevens
Page 291;Photo by Menno Wigmore

Lovely Language is based on research by Laura van Uitert for her graduation project in 2006. If she hadn't done this, we would never have made this book or the exhibition. But the most important was Utrecht Manifest, which challenged me, as an intendant, to compose a program for an exhibition for the second edition of this biennale for socially involved design. Since 1983, I had been searching for the right context for an exhibition and a publication about Gerd Arntz and Otto Neurath.

Special thanks to Peter Arntz, for providing us lots of information about his father's work and ideals with a great deal of enthusiasm, and the Gemeentemuseum of The Hague, for opening their Gerd Arntz archive for our research, and of course, to all the designers and artists who loaned their work and allowed us to use it for the exhibition and this book.

Ed Annink, December 2007



From left to right:
Laura van Uitert,
Ed Annink,
Max Bruinsma

Colophon

Lovely Language - words divide, images unite
was exhibited in the Centraal Museum Utrecht, The Netherlands, from November 25th, 2007 till February 11th, 2008. The exhibition was part of Utrecht Manifest, edition 2007, for which Ed Annink was the intendant. This book is based on the exhibition.

Publisher Veenman Publishers, Rotterdam
Editor Ed Annink
Text Max Bruinsma
Research and editorial assistance Laura van Uitert
Translations Hebzibah Kousbroek (introduction), Max Bruinsma
Design exhibition and book Ontwerpwerk, The Hague
Production Veenman Publishers / Sebastiaan Hanekroot
Printing Veenman Drukkers
Print run 3.500

This publication was generously supported by
Mondriaan Foundation, Amsterdam

Acknowledgements
Peter Arntz, Lars Arrhenius, De Beyerd, Mijksenaar, Silvija Cerne, Alicia Cheng, Gert and Derk Dumbar, Ethnologue, Martin Friedl, Gemeentearchief Amsterdam, Gemeentearchief Rotterdam, Gemeentemuseum The Hague, Mieke Gerritzen, Joost Grootens, Juli Gudehus, Arnoud van den Heuvel, Intégral Ruedi Baur and Associés, Susan Kare, Max Kisman, Pippo Lionni, Yang Liu, Hans-Rudolf Lutz, Chaz Maviyane-Davies, Ton Meijdam, Koert van Mensvoort, Ferdinand Mertens, Myriad Editions, Charles Sandison, Andreas Siekmann, Social and Cultural Planning Office of the Netherlands, Erik Spiekermann, Toko, Annelys de Vet, Edgar Walthert, Westeinde Hospital, Piet Westendorp, Richard Saul Wurman.

Publisher
Veenman Publishers / Gijs Stork
Sevillaweg 140
3047 AL Rotterdam- NL
t. +31 10 245 3333
f. +31 10 245 3344
info@veenmanpublishers.com
www.veenmanpublishers.com

Distribution
D.A.P.
155, Sixth Avenue, 2nd floor
New York, NY 10013, USA
t. + 1 212 627 1999
dap@dapinc.com

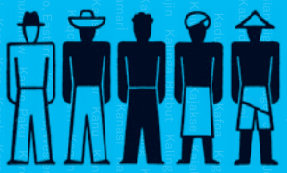
Exhibitions International
Art & illustrated books
Kol. Begaultlaan 17
B-3012 Leuven
Belgium
t.+32 016 296 900
orders@exhibitionsinternational.be
www.exhibitionsinternational.be

vice versa Vertrieb
Immanuelkirchstr. 12
D-10405 Berlin
Deutschland
Tel+ 49 (30) 61609236
fax: +49 (30) 61609238
info@vice-versa-vertrieb.de.
www.vice-versa-vertrieb.de

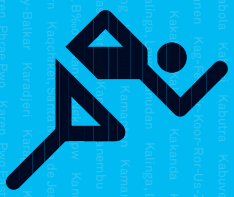
Mondriaan Stichting
(Mondriaan Foundation)

utrecht
mani
fest Edition
2007

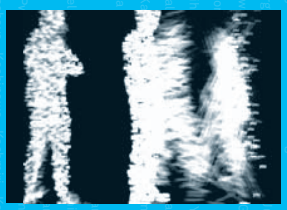
lovely language words divide images unite



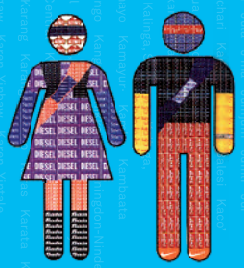
Isotype pictograms
Gerd Arntz, 1930s



Pictogram for the Olympic Games in Munich, Otl Aicher, 1972



People
Charles Sandison, 2003



Label people
Mieke Gerritzen, 2000

The world speaks in about 7000 tongues, and countless dialects. For centuries, people have tried to overcome this tower of Babel. For instance by propagating one language or by making a new language, such as Esperanto. But the language which today is best understood world-wide does not consist of words, but of images. A universal visual language was the ideal of two Modernists: the social scientist and philosopher Otto Neurath (1882-1945) and graphic designer Gerd Arntz (1900-1988). In Vienna, from the 1920s onward, they developed more than 4000 icons, which together formed Isotype: a visual language in which important information on society, politics, economy and industry could be summarized, also for those who could not read well. Thus Neurath's motto: 'words (which not everyone can read) divide, images (which can be understood by all) unite.' Nowadays, the whole world communicates in images. But with its dissemination, this lovely language for all spawns more and more dialects. Visual language has grown up; everyone understands its basics, but individuals vary on it to write their own visual poetry.

This book aims at providing material for the discussion about visual communication tomorrow. Are the generic guidelines of Otto Neurath and Gerd Arntz still valid? Or have they become embedded into a visual language that by now goes well beyond their project? And what is the future role of designers and communicators in using and expanding this language?

ISBN 90-6369-062-2

