

IDN Global Deployment – The Wider History and Status

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Flavors of IDN

- **Hybrid IDN**
idn.ascii (or ML.ascii)
- **Full IDN**
idn.idn (or ML.ML)
- **Hybrid internationalised email addresses**
idn@idn.ascii or idn@ascii.ascii
(or ML@ML.ascii or ML@ML.ML)
- **Full internationalised email addresses**
idn@idn.idn (or ML@ML.ML)

Resolution Methods

- **Two methods of resolving these IDN names have been attempted. One is the plug-in or browser-enablement approach approved by ICANN. The most widely distributed plug-ins being CNNIC's plug-in (within China), Verisign's iNav and I-dns.net's iClient. Mozilla is the only significant browser that has a built-in capability.**
- **Patching the ISP servers which is not recommended by ICANN. This has been done in a few dozen ISPs worldwide with significant penetration (in excess of 50% of all the country's Internet users) in Korea, Egypt and China.**

Non-commercial IDN deployment

- **Mar 98 - July 98**

First tests within National University of Singapore (NUS) and between NUS and individuals in Korea and Japan etc. CJK and other languages. Tens of names.

- **Oct 98 - Oct 99**

Asia-Pacific Networking Group (APNG) endorsed testbed conducted by NUS spin-off and the NICs of the Asia-Pacific region - JPNIC, KRNIC, CNNIC, pre-TWNIC etc. Asian languages deployed (Arabic, European, Indian tested). Hundreds and thousands of names.

Non-commercial internationalised email address deployment

- **July 98 - Sep 98**

First tests within National University of Singapore (NUS) and between NUS and individuals in Korea and Japan etc. CJK and other languages. Tens of addresses.

- **Oct 98 - Oct 99**

Asia-Pacific Networking Group (APNG) endorsed testbed conducted by NUS spin-off and the NICs of the Asia-Pacific region - JPNIC, KRNIC, CNNIC, pre-TWNIC etc. Asian languages. 100's of addresses.

Commercial Launches of IDN (1999 to Now)

Date	Country	Language	Type	Org	Support
Dec 99	Taiwan	Chinese	idn.idn	i-dns.net	Minister, ISPs
Feb 00	China	Chinese	idn.idn	i-dns.net	
Mar 00	HK	Chinese	idn.idn	i-dns.net	Major ISP, Portal
Mar 00	India	Tamil	idn.idn	i-dns.net	Chief Minister
Apr 00	China	Chinese	idn.idn	cnnic	Ministry, ISPs
May 00	Tuvalu	Many	idn.tv	dot tv/i-dns	Government
Jun 00	Cooks	Many	idn.cc	enic/i-dns	Government
Aug 00	Thailand	Thai	idn.idn	i-dns.net	Key ISPs
Sep 00	Egypt	Arabic	idn.idn	I-dns.net	Minister
Nov 00	World	CJK	idn.com	Verisign	ICANN registrars
			idn.net /org		

Commercial Launches of IDN (1999 to Now)

Date	Country	Language	Type	Org	Support
Feb 01	India	Telugu	idn.idn	i-dns.net	Chief Minister
Mar 01	Nuie	Swedish	idn.nu	Worldnames	
May 01	Russia	Russian	idn.idn	i-dns.net	Chamber Comm.
Apr 01	Korea	Korean	idn.idn	i-dns.net	Registrars/ISPs
Apr 01	Israel	Hebrew	idn.idn	I-dns/DTN	Info Minister
May 01	Japan	Japanese	idn.idn	i-dns/ejapan	
Jun 01	India	Hindi	idn.idn	i-dns/Synfo	Prime Minister
Jul 01	Japan	Japanese	idn.jp	jpnic	jpnic
Feb 02	Belize	Many	idn.bz	Neteka	bznic
Jun 02	Djbouti	Korean	idn.dj	i-dns/dot DJ	President
Jun 03	China	Chinese	idn.cn	cnnic	cnnic
Aug 03	Korea	Korean	idn.kr	krnic	krnic

Commercial Launches of IDN (1999 to Now)

Date	Country	Language	Type	Org	Support
■ Sep 03	Poland	Polish	idn.pl	plnic	plnic
■ Oct 03	Sweden	Swedish	idn.se	senic	senic
■ Jan 04	Denmark	Danish	idn.dk	dknice	dknice
■ Jan 04	Global	Many	idn.museum		dotmuseum
■ Feb 04	Norway	Norwegian	idn.no	nonic	nonic
■ Mar 04	Germany	German	idn.de	denic	denic
■ Mar 04	Austria	Austrian	idn.at	atnic	atnic
■ Mar 04	Switzerland	European	idn.ch	chnic	chnic
■ Mar 04	Latvia	Latvian	idn.lv	lvnic	lvnic
■ Mar 04	Global	German	idn.info	Afilias	ICANN
■ Jan 05	Global	German	idn.org	PIR	ICANN
■ May 05	Brazil	Portuguese	idn.br	brnic	brnic

Commercial Launches of IDN (1999 to Now)

Date	Country	Language	Type	Org	Support
■ Jul 05	Greece	Greek	idn.gr	grnic	grnic
■ Jul 05	Singapore	Chin/Tam	idn.sg	sgnic	sgnic
■ Sep 05	Finland	Finnish	idn.fi	finic	finic
■ Sep 05	Hungary	Hungarian	idn.hu	hunic	hunic
■ Sep 05	Chile	Spanish	idn.cl	clnic	clnic

Deployment by the Numbers

- **IDN** - since late 1999 – author's estimates
- Close to 2 000 000 purchased in over 50 languages.
- But 90% of it in just CJK.
- Over 1 000 000 purchased as part of Verisign IDN.com in 2000 but has since fallen to much smaller, owing to non-renewal. A much smaller number measuring in thousands in other gtlds – eg. IDN.info and IDN.museum.
- Another 400 000 in IDN.jp, IDN.tw, IDN.tv, IDN.kr, IDN.cn and other cctlds. > 80% in Asian cctlds.
- Another 400 000 initially in chinese.chinese (IDN.IDN), dropped dramatically, but now with official approval and near-universal resolution in China is growing to 100 000 again.
- Other language IDN.IDN's (arabic, hebrew, russian, korean etc. - some 15 languages) at one point approached 50 000 but now around 10 000 and growing again.

Progress in Resolution

(author's estimates)

- **Browser-based resolution (Total 70M users)**
 - ◆ **>1M users enabled by each of**
 - ★ Safari
 - ★ Opera
 - ◆ **1to10M users enabled by each of**
 - ★ Netscape/Mozilla
 - ★ iNav/Verisign
 - ★ iClinet/I-dns.net
 - ◆ **> 50M users enabled by each of**
 - ★ CNNIC plug-in

Progress in Resolution

(author's estimates)

- **ISP Server-based resolution (Total 85M users)**
 - ◆ **China (~70M users)**
 - ◆ **Korea (~10M users)**
 - ◆ **Other (~5M users)**

- **Total Global Resolution Estimate ~ 115M users**
 - ◆ **China (~90M users) (full IDN)**
 - ◆ **Korea (~10M) (full IDN)**
 - ◆ **Other (~15M) (full and hybrid IDN)**

Summary

- IDN has been commercially launched for 6 years - from Dec 99.
- The 2 million cumulative paid-IDN registrations is not too different from the number of ascii domain names in use when ICANN was established.
- When IDN was being commercially launched in late 1999, the number of ascii domain names was less than 5 million.
- When viewed this way IDN is not in infancy, it has been around for a while, though except for the deployment of IDN.IDN within China its not easy to use because of widespread lack of resolution.