

عربی (Arabic)

IDNs and Variants for the Root



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Recent Community Work on Arabic IDNs

- Very active Arabic script community; time line of recent Arabic script community work
 - 2008: Arabic Script IDN Working Group (ASIWG)
 - 2009: ICANN IDN ccTLDs Fast Track Program initiated
 - 2010: Arabic Language in Internet Domains (RFC 5564)
 - 2011: Arabic Script Case Study for IDN Variants in the Root
 - 2012: User Experience Study on IDN Variants in the Root
 - 2013: Task Force on Arabic Script IDNs by MESWG
- Significant expertise in a variety of relevant domains: Unicode, DNS, IDNA and Registry and Registrar Operations
 - experience from SLD deployments in ccTLDs
 - experience from IDN ccTLD deployments

Typology of Arabic IDN Variants

- Same
 - Identical U+06CC (ى)/U+0649 (ى)
 - In Context U+06A9 (كېك)/U+0643 (كك)
 - Normalization U+0632 (ز)/U+0631+U+06EC (ر + ّ = ز)
- Similar
 - Character U+06AA (ك)/U+06A9 (ك)
 - Diacritic U+062A (ت)/U+067A (ث)
- Different
 - Shape U+0629 (بة)/U+06C3 (بّة)
 - Character U+0629 (ة)/U+06C1 (ه)

IDN Variants Needs and Challenges

Security and Stability Needs

پاکستان

U+0643

xn--mgbai9a5eva00b

پاکستان

U+06A9

xn--mgbai9azgqp6j

- 120+ cases of visually same or similar Arabic script characters identified by case study team
 - Variants must not be allocated independently
 - Variants may need activation to allow user access (w/ different KB)
- 16 IDN ccTLD applications with 4 applications with variants

Security and Stability Challenges

- Consistency and innumerability
 - Consistent across and within TLDs
 - Minimal activation for manageability
- Management tools
 - Registration
 - Configuration and Maintenance
 - Security and Monitoring
- Usability in applications
 - Browsing, emailing, etc.
 - Searching, privacy, etc.

Way forward for Community: **Task Force on Arabic Script IDNs**

- Creation and Oversight by community based MESWG
- Objectives: a holistic approach
 - Arabic Script Label Generation Ruleset (LGR) for the Root Zone
 - Second level LGRs for the Arabic script
 - Arabic script Internationalized Registration Data Protocol and Practice
 - Universal acceptability of Arabic script IDNs and variants
 - Technical challenges around registration of Arabic IDNs and variants
 - Operational software for Arabic script IDN registry and registrar operations
 - DNS security matters specifically related to Arabic IDNs and variants
 - Technical training material around Arabic script IDNs

Task Force on Arabic Script IDNs

- Membership open, community based
- Details and interests of members posted by MESWG
- Discussions publicly archived
- Details at <http://lists.meswg.org/mailman/listinfo/tf-aidn>

- Open Call for Participation in August-Sept. 2013
- Announced at Arab IGF II in Algeria on 2nd Oct. 2013
- 20 members from 15 different countries
- Covering a diverse set of languages which use Arabic script from East Asia, South Asia, Middle East, North Africa, Sub-Saharan Africa

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Thank you