Basic Policy proposals for IDN ccTLD String Selection Process

Version 7 - 26 June 2023

This version includes an update of following the completion of the stress testing

The basic policy recommendations document has been updated to include suggestions pertaining to Confusing Similarity Validation
Not included yet:

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Section 0. Overall Principles

The purpose of the overarching principles is to set the parameters within which the policy recommendations have been developed, and should be interpreted and implemented. They take into account the experiences of the IDN Fast Track Process and subsequent discussions. They have been developed to structure, guide and set conditions for the recommended policy, its implementation and future interpretation.

I. **Association of the (IDN) country code Top Level Domain with a territory.** For purposes of this policy "Territory" or "Territories" are defined as a country, a subdivision, or other area of particular geopolitical interest listed in Section 3 of the 'International Standard ISO 3166, Codes for the representation of names of countries and their subdivisions – Part 1: Country Codes' [ISO 3166-1:2020] or, in some exceptional cases, e.g. grandfathered-in delegations, a country, a subdivision, or other area of particular geopolitical interest listed for an exceptionally reserved ISO 3166-1 code element.

Under the current policy for the delegation of (ASCII) ccTLDs[1], the country codes associated with **Territories** are eligible for delegation as a ccTLD. Only IDN ccTLD strings associated with a **Territory** are eligible to be delegated as a ccTLD.

Retirement of the IDNccTLD. If the name of a **Territory** is removed from the ISO3166 because it is divided into two or more new Territories or two or more Territories have merged, the removal is considered a "trigger event" and causes the initiation of the process for the retirement of **all the selected IDNccTLD(s) (and their variants),** which are a meaningful representation of the name of the **Territory**. However, However, if a selected IDnccTLD string is a meaningful representation in the Designated Language of the merged Territory, and the Significantly Interested

[1] RFC 1591 as interpreted by the Framework of Interpretation (https://ccnso.icann.org/sites/default/files/filefield_46435/foi-final-07oct14-en.pdf)

Parties of the "merged" Territory support the IDNccTLD, it should not be retired. Note that the basic criteria only one (1) IDN ccTLD string per Designated Language applies (section 1.3.2). So if there is already a IDNccTLD for the merged territory in the same Designated Language, the IDNccTLD of the Territory that is subsumed in the other Territory shall need to be retired.

II. **(ASCII) ccTLD and IDN ccTLDs are all country code Top Level Domains.** (ASCII) ccTLD and IDN ccTLDs are all country code Top Level Domains and as such are associated with a **Territory**. Whilst there may be additional, specific provisions required for IDN ccTLDs, due to their nature (for example criteria for the selection of an IDN ccTLD string), all country code Top Level Domains should be treated in the same manner.

III. **Preserve security, stability and interoperability of the DNS.** To the extent different and/or additional rules are implemented for IDN ccTLDs, these rules should:

a. Preserve and ensure the security and stability of the DNS;
b. Ensure adherence with the RFC 5890, RFC 5891, RFC 5892, RFC 5893
c. Take into account and be guided by the Principles for Unicode Code Point Inclusion in Labels in the DNS Root (RFC 6912).

IV. **Ongoing Process.** Requests for the delegation of IDN ccTLDs should be an ongoing process and requests CAN BE submitted at any time, which also applies to requesting variants that meet the criteria under this proposed policy. Currently the delegation of a ccTLD can be requested at any time, once all the criteria are met.

V. **Criteria determine the number of IDN ccTLDs.** The criteria to select the IDN ccTLD string should determine the number of eligible IDN ccTLDs per **Territory**, not an arbitrarily set number.

New Overview of the policy applicable to IDNccTLDs

1.1 Two-Step Process IDNccTLD string selection process.

Under the overall policy a two-stage process is recommended for the selection of an IDN ccTLD string:

- Step 1: String selection stage in Territory
- Step 2: Validation of IDN ccTLD string

The policy recommendations on process, procedures and required documentation, if any, will be described both at a general and detailed level for both stages.

1.1.2 Stage 1: String Selection in Territory

General Description

The string selection stage is a local matter in Territory and should ideally involve all relevant local actors in Territory. The actors in Territory must:

1. Identify the script and language for the IDN Table and prepare this Table if necessary,
2. Select the IDN ccTLD string. The selected string must meet the meaningfulness and technical requirements and should not be confusingly similar.
3. Document endorsement /support of the relevant stakeholders in Territory for the selected string, and
4. Select the intended IDN ccTLD string requester before submitting an IDN ccTLD string for validation. In cases where the string requester is not yet selected, the relevant public authority of the Territory may act as nominee for the to be selected string requester.

As part of the in territory step the following documentation must be prepared:

i. Documentation of the meaningfulness of the selected IDN ccTLD string according to requirements described in section 1.2.6

ii. Documentation Designated Language according to requirements described in. section 1.2.7.

iii. Documentation of required endorsement / support for selected string by Significantly Interested Parties, according to requirements described in section 2.2

Notes and Comments

As stated, the string selection stage is a local matter in Territory and should ideally involve all relevant local actors in Territory. Typically, this would include:

- The IDN ccTLD string requester. This actor initiates the next step of the process, provides the necessary information and documentation, and acts as the interface with ICANN. Typically this actor is the expected IDN ccTLD manager.
- Significantly Interested Parties.
    - The relevant public authority of the Territory associated with the selected IDN ccTLD.
    - Parties to be served by the IDN ccTLD. They are asked to show that they support the request and that it would meet the interests and needs of the local Internet community.

Additionally, these actors may wish to involve recognized experts or expert groups to assist them to select the IDN ccTLD string, prepare the relevant IDN Table or assist in providing adequate documentation.

Further, and at the request of the actors in **Territory**, ICANN may assist them with the in-Territory Process.

1.1.3 Stage 2: Validation of IDN ccTLD string

General description

The String Validation stage is a set of procedures to ensure all criteria and requirements regarding the selected IDN ccTLD string have been met. Typically this would involve:

- The IDN ccTLD string requester. This actor initiates the next step of this stage of the process by submitting a request for adoption and associated documentation.
- ICANN staff. ICANN staff will process the submission and coordinate between the different actors involved.
- External, Independent Panels (Technical, Similarity & Risk Mitigation Appraisal) to validate the selected string and its variant(s).

The activities during this stage would typically involve:

- Submission of selected string and related documentation.
- Validation of selected IDN ccTLD string:
    a. ICANN staff validation of request. This includes:
        i. Completeness of request
        ii. Completeness and adequacy of Meaningfulness and Designated Language documentation
        iii. Completeness and adequacy of support from relevant public authority
        iv. Completeness and adequacy of support from other Significantly Interested Parties

    b. Independent Reviews
        i. Technical review
        ii. String Confusion review

- Publication of selected IDN ccTLD string on ICANN website
- Completion of string Selection Process
- Change, withdrawal or termination of the request.

1.2 Applicability of other Policies

All ccTLD policies with respect to the delegation, transfer, revocation and retirement of ccTLDs are applicable to the delegation, transfer, revocation and retirement of (variant) IDNccTLDs. However, specific requirements under such a policy may vary for the selected IDN ccTLD string and its variants if foreseen under this policy.

For avoidance of doubt if a selected IDNccTLD string is transferred, revocated, or retired, all Degetable Variants which have been delegated, shall follow the transfer, revocation or retirement of the selected IDNccTLD string.

1.2.1 Specific requirement following the retirement of the selected IDNccTLD string

Following the conclusion of its retirement process a selected IDNccTLD string is removed from the DNS, the selected IDNccTlD string shall not be available for re-assignment or selection for at least 10 years following the removal. During this period of 10 years the ccNSO is expected to launch a ccNSO Policy Development Process on the issue of re-use of IDNccTLD strings. Factors to consider in such a ccPDP on possible re-use are:

- Use of the IDNccTLD before retiement
- Cause of retirement
- Possible re-use of the IDNccTLD string
- Mechanism to allow re-use

Notes and Observstions

Under ISO3166-1 there is a standard cool down -period (or a removal of the territory from the ISO3166- 1 standard. Accordingly (section 7.6.2) *Country code elements that the ISO 3166/MA has altered or deleted should not be reassigned during a period of at least fifty years after the change. The exact period is determined in each case on the basis of the extent to which the former code element was used.*

Although a request for re-use may be very unlikely (taking into account that the selected string has to be a meaningful representation of the name of the Territory) a cooling down is believed to be warranted to avoid overlap with earlier TLDs and other potential issues resulting from other uses of the IDNccTLD string that is removed.

1.3 **REVIEW MECHANISM for decisions under the proposed policy**

Some proposals under this proposed policy may result in ICANN org decisions to de-select an IDNccTLD string and/or its variants, and hence to retire an IDNccTLD or its variants. According to the ccTLD retirement policy (as adopted in September 2022), the retirement of an (IDN)ccTLD requires the IFO to serve a Notice of Retirement to the (IDN)ccTLD Manager. This Notice formally starts the (clock of the) ccTLD retirement process.

Similar as under the proposed ccPDP3 Review Mechanism policy – if a ccTLD Manager is directly impacted by a Notice of Retirement for two-letter Latin ccTLD which does not correspond to an ISO 3166-1 Alpha-2 Code Element - it is proposed that the review mechanism should be available to an IDNccTLD Manager who is served a Notice of Retirement following the de-selection of an IDNccTLD string and/or its variants strings resulting from:

- (Section 1.3. De-selection.) Change of Name of the Territory, Change of designated language, Change of script or writing system
- (Section 2.3.) Impact IDNccTLD string becomes contentious within the Territory
- (Section 3.2.4.)Demonstrable threat of DNS security and stability of the DNS as the result of the impact of an amendment of the RZ-LGR.

Notes and Observations

Note 1. The case that the de-selection of an IDNccTLD and its variants is the result of the removal of the name of the **Territory** from the ISO3166 is excluded from the review process. The decision to remove the name of a territory from the ISO3166-1 is an external decision (ISO3166-MA).

Rationale: The circumstance leading up to the removal of a line item should not be subject to a review. This reflects the basic understanding that *IANA (read ICANN) is not in the business of determining what is and what is not a country (read Territory)* and further the understanding that ISO has a process to do so.

Note 2. Note that due to its nature the Confusing Similarity Validation Process includes specific procedure to allow for the review of the outcome of the first evaluation and – related and under specific circumstances – review measures to mitigate risks associated with the visual confusability of a selected IDNccTLD string.

Rationale: Firstly, the IFO is not involved in any decisions pertaining to confusing similarity or whether a IDNccTLD string meets the technical criteria. Secondly, by its very nature confusing similarity review is subjective. Therefore, a second, alternative approach is needed to limit the level of subjectivity. Finally, the purpose of confusing similarity validation is to reduce security risks associated with the introduction of a IDNccTLD. Under specific circumstances alternative measures reduce the risk associated with confusion to an acceptable level.

Section 1. Criteria for the selection of IDN ccTLD strings

1.1 Minimal Number of non-ASCII characters

An IDN country code Top Level Domain must contain at least one (1) non-ASCII character (i.e a character that is not included in ISO/IEC 646 Basic Character Set). To illustrate this criterion: For example, *españa* would qualify under this specific requirement and *italia* would not. Note that *españa* contains at least one (1) non-ASCII character (i.e a character that is not included in ISO/IEC 646 Basic Character Set[3] . For more formal definitions of these terms, see RFC 5890.

Further, the selected U-label of IDNccTLD string must contain at least two characters. This requirement should be reviewed as part of the first review of the policy (see section 9.E below).

Notes and Observations

If a single character string meets all criteria, nothing would prevents it from being requested. However note SAC 052 (2012) : https://www.icann.org/en/system/files/files/sac-052-en.pdf In SAC 052 two potential issues were identified:

- Single Character TLDs are more likely to cause user confusion than TLDs with more characters
- Work on user confusion/string similarity and IDN variants needs to be completed,

Currently, the work on confusion/ string similarity is not completed nor will it be completed in foreseeable future. Therefore the concerns raised in SAC052 are still relevant. Taking into account the need to ensure the security and stability of the DNS, the application for Single character IDNs under this proposed policy is currently deferred.

[3] https://www.iso.org/standard/4777.html

1.2 Meaningfulness Criteria and related processes and procedures

1.2.1 The IDN ccTLD string must be a Meaningful Representation of the name of a Territory. The principle underlying the representation of **Territories** in two letter (ASCII) **code elements** is the visual association between the names of **Territories** (in English or French, or sometimes in another language) and their corresponding **code elements**.
The principle of association between the IDN country code string and the name of a **Territory** should be maintained. A selected IDN ccTLD string MUST be a meaningful representation of the name of the **Territory**. A country code string is considered to be a **Meaningful Representation** if it is:

a) The name of the **Territory**; or
b) Part of the name of the **Territory** that denotes the **Territory**; or
c) A short-form designation for the name of the **Territory**, recognizably denoting the name.

1.2.2 A Meaningful Representation of the name of the Territory must be in a Designated Language of the Territory. The selected IDN ccTLD string should be a **Meaningful Representation** of the name of the territory in a **Designated Language** of that **Territory**. For this purpose, a **Designated Language**[4] is defined as: a language that has a legal status in the **Territory** or that serves as a language of administration[5].

[4] The limitation to Designated Language is recommended as criteria for reasons of stability of the DNS. According to some statistics currently 6909 living languages are identified. See for example: http://www.ethnologue.com/ethno_docs/distribution.asp?by=area. If one IDN ccTLD would be allowed per territory for every language this would potentially amount to 252*6909 or approximately 1.7 million IDN ccTLDs

[5] The definition of **Designated Language** is based on: "Glossary of Terms for the Standardization of Geographical Names", United Nations Group of Experts on Geographic Names, United Nations, New York, 2002 https://unstats.un.org/unsd/ungegn/pubs/documents/Glossary_of_terms_rev.pdf . Note that in the Glossary the term "Official Language" is used. Experience has shown that, depending on the specific Territory, "Official Language" has a specific connotation, which sometimes creates confusion with the term "Official Language" as defined in the Glossary.

The language is considered to be a **Designated Language** if one or more of the following requirements is/are met:

a) The language is listed for the relevant **Territory** as an ISO 639 language in Part Three of the "Technical Reference Manual for the standardization of Geographical Names", United Nations Group of Experts on Geographical Names (the UNGEGN Manual) (https://unstats.un.org/unsd/geoinfo/ungegn/docs/11th-uncsgn-docs/E_Conf.105_13_CRP.13_15_UNGEGN%20WG%20Country%20Names%20Document.pdf).

b) The language is listed as an administrative language for the relevant **Territory** as defined in section 3.7 of ISO 3166-1 standard [2020].

c) The relevant public authority in the **Territory** confirms that the language is used in official communications of the relevant public authority and serves as a language of administration.

Specific requirements regarding documentation of **Designated Languages** are included in the procedures and documentation sections *(see below section 2.7*).

1.2.3 Only one (1) IDN ccTLD string per Designated Language. In the event that there is more than one **Designated Language** in the **Territory**, one (1) unique IDN ccTLD for each **Designated Language** may be selected, provided the **Meaningful Representation** in one **Designated Language** cannot be confused with an existing IDN ccTLD string for that **Territory**.

It should be noted that for purposes of this policy, the restriction of one (1) IDN ccTLD string per **Designated Language** does not apply to the selection and delegation of variants of the selected IDNccTLD string, however this exception applies only to the extent the other requirements under this policy for the request and the delegation of variants of the selected IDNccTLD string are met.

Where a language is expressed in more than one script in a **Territory**, then it is permissible to have one string per script, although the multiple strings are in the same **Designated Language**.

Notes and Observations
It should be noted that other requirements relating to non-confusability are applicable and should be considered, including the specific procedural rules and conditions for cases when the same manager will operate two or more (IDN) ccTLD's which are considered to be confusingly similar.

1.2.4 If the selected string is not the long or short form of the name of a Territory then evidence of meaningfulness is required. If the selected IDNccTLD string is the long or short form of the name of the relevant **Territory** in the **Designated Language and** is listed in the UNGEGN Technical Reference Manual for the Standardization of Geographic Names, Part Three column 3 or 4 version 2007[6], or a later version of that list, it is considered to be a **Meaningful Representation**.

If the **Meaningful Representation** of the selected string is **NOT** listed in the UNGEGN Technical Reference Manual for the Standardization of Geographic Names, Part Three column 3 or 4 version 2007, or a later version of that list, then meaningfulness must be adequately documented. Adequate documentation MUST be provided if one of the following cases applies:

1. The selected IDNccTLD string is not the long or short form name of the **Territory** as included in the UNGEGN Manual in the **Designated Language,**

[6] https://unstats.un.org/unsd/ungegn/pubs/documents/UNGEGN%20tech%20ref%20manual_m87_combined.pdf . Note that the UNGEGN Technical Reference Manual only contains the names of 192 Countries, which is a sub-set of all the Territories listed under the ISO 3166 standard.

or

2. The selected IDNccTLD string is an acronym of the name of the **Territory** in the **Designated Language**

or

3. The selected IDNccTLD string is the name of a **Territory** that does not appear in the UNGEGN Manual,

or

4. The selected IDNccTLD string is in a **Designated Language** that is not included in the UNGEGN Manual.

If such documentation is required, the documentation needs to clearly establish that:

- The meaning of the selected string in the **Designated Language** and English and
- That the selected string meets the meaningfulness criteria.

Specific requirements regarding documentation to demonstrate the **Meaningful Representation** are included in the procedures and documentation recommendations (see section 2.5 and 2.7 below).

1.2.5 Documentation of the meaningfulness of the selected IDN ccTLD string

The selected IDN ccTLD string(s) must be a **Meaningful Representation** of the name of the corresponding **Territory**. A string is deemed to be meaningful if it is in the **Designated Language** of the **Territory** and if it is:

1. The name of the **Territory**; or
2. A part of the name of the **Territory** denoting the **Territory**; or
3. A short-form designation for the name of the **Territory** that is recognizable and denotes the **Territory** in the selected language.

The meaningfulness requirement is verified as follows:

1. If the selected string is listed in the UNGEGN Manual, then the string fulfills the meaningfulness requirement.
2. If the selected string is not listed in the UNGEGN Manual, the requester must then substantiate the meaningfulness by providing documentation from an internationally recognized expert or organization.

ICANN should recognize and accept documentation from one of the following experts or organizations as internationally recognized:

- **National Naming Authority** – A government recognized National Geographic Naming Authority, or other organization performing the same function, for the **Territory** for which the selected string request is presented. The United Nations Group of Experts on Geographical Names (UNGEGN) maintains such a list of organizations at: https://unstats.un.org/unsd/geoinfo/ungegn/publications.html [unstats.un.org]
- **National Linguistic Authority** – A government recognized National Linguistic Authority, or other organization performing the same function, for the **Territory** for which the selected string request is presented.

In the exceptional circumstance where there is no access to a National Naming Authority nor to a National Linguistic Authority for the **Territory,** assistance may be requested from ICANN to identify and seek reference to an expert or organization to provide the required documentation. This documentation will be considered acceptable and sufficient to determine whether a string is a **Meaningful Representation** of a **Territory** name.

Notes and Observations. ICANN should include in the implementation plan an example of the documentation that demonstrates the selected IDN ccTLD string(s) is a Meaningful Representation of the corresponding **Territory**.

ICANN should include a procedure in the implementation plan, including a timeframe, to identify expertise referred to or agreed as set out in the final paragraph of section 1.2.5 above.

1.2.6 Documentation Designated Language. The requirements for allowable languages and scripts to be used for the selected IDN ccTLD string is that the language must be a **Designated Language** in the **Territory** as defined in section (see above`). The language requirement is considered verified if one of the following conditions is met:

1. If the language is listed for the relevant **Territory** as an ISO 639 language in Part Three of the *Technical Reference Manual for the standardization of Geographical Names, United Nations Group of Experts on Geographical Names* ("UNGEGN Manual") (http://unstats.un.org/unsd/geoinfo/default.htm);

   or

2. If the language is listed as an administrative language for the relevant **Territory** in ISO 3166-1;

   or

3. If the relevant public authority of the **Territory** confirms that the language is used or serves as follows, (either by letter or link to the relevant government constitution or other online documentation from an official government website):
   a. Used in official communications by the relevant public authority;

      or

   b. Serves as a language of administration.

Further, the documentation must include a reference to the script or scripts in which the **Designated Language** is expressed and which MUST be listed in the script charts of the latest version of UNICODE.

Notes and Observations

ICANN should include an example of the documentation that the selected language(s) is considered designated in the Territory in the implementation plan.

1.3 Deselection of IDNccTLD

1.3.1 Impact change of name of the Territory

The selected IDNccTLD string is no longer a (visual) association with the name of the Territory. The general policy requirement is that an IDN ccTLD string must be a **Meaningful Representation** of the name of a T**erritory**. The principle underlying the representation of **Territories** in two letter (ASCII) **code elements** is the visual association between the names of **Territories** (in English or French, or sometimes in another language) and their corresponding **code elements**.

The principle of association between the IDN country code string and the name of a **Territory** is maintained: a selected IDN ccTLD string MUST be a meaningful representation of the name of the **Territory**.

The IDN ccTLD will be considered de-selected and should be retired when it is evidenced that a selected and /or delegated IDNccTLD string is no longer (de-selected) a **Meaningful Representation** of:

a) The name of the **Territory** in the **Designated language of the Territory,**
b) Part of the name of the **Territory** in the **Designated language** of the **Territory** that denotes the **Territory,** or
c) The short-form designation for the name of the Territory in the **Designated language** of the **Territory** (for example the two-letter or three-letter **country code** transliterated into the **Designated Language**).

The de-selection of an IDNccTLD string is evidenced as follows:

1. If the meaningfulness requirement at the time of the delegation of the string was verified by listing of (part of the name) in the **Designated Language** of the **Territory** in the UNGEGN Manual, the name of the **Territory** in the **Designated Language** is no longer included.

2. If the meaningfulness was substantiated by providing documentation from an internationally recognized expert or organization[7], by documentation or a statement of a similar, internationally recognized expert or organization that the selected string no longer denotes the name nor is a short-form designation for the name of the **Territory** in the **Designated language** of the **Territory (**hereafter**: Statement of (dis-)association** or if such a statement cannot be provided within a reasonable time (3 months) upon request of ICANN.

Confirmation of association or dis-association.

ICANN is not expected to actively seek confirmation of association or dis-association of an IDNccTLD string with the name of the Territory.

However, if ICANN receives a valid request[8] for an IDNccTLD string for a **Territory** which is in the same Designated Language and related script as an IDNccTLD string associated with the same **Territory** that is either in the verification

[7] Note already included): ICANN should recognize and accept documentation from one of the following experts or organizations as internationally recognized:

- National Naming Authority – A government recognized National Geographic Naming Authority, or other organization performing the same function, for the **Territory** for which the selected string request is presented. The United Nations Group of Experts on Geographical Names (UNGEGN) maintains such a list of organizations at: https://unstats.un.org/unsd/geoinfo/ungegn/publications.html [unstats.un.org]
- National Linguistic Authority – A government recognized National Linguistic Authority, or other organization performing the same function, for the **Territory** for which the selected string request is presented. In the exceptional circumstance where there is no access to a National Naming Authority nor to a National Linguistic Authority for the **Territory,** assistance may be requested from ICANN to identify and seek reference to an expert or organization to provide the required documentation. This documentation will be considered acceptable and sufficient to determine whether a string is a **Meaningful Representation** of a **Territory** name.
  See section 1.2.5.

[8] Note this includes documentation of support by the SIP!!

process or has been delegated, ICANN shall require a **Statement of (dis-)association** from the requester or IDNccTLD Manager of the first IDNccTLD string for the name of the Territory.

If such a **Statement of (dis-)association** cannot be provided within a reasonable time frame (3 months upon notification by ICANN), the first IDNccTLD string is deemed to be de-selected and shall be retired. As of the time a **Statement of (dis-)association** is requested until such a time the **Statement** is provided or after the reasonable time frame has passed (whatever is the earliest), the processing of the requested IDNccTLD strings for that **Territory** shall be put on hold.

If according to the **Statement of (dis-)association** the first requested IDNccTLD string or delegated IDNccTLD string is still associated with the name of the **Territory** as required, the latter requested IDNccTLD string shall be considered invalid and the requester and the related government will be informed accordingly.

ICANN should include in the implementation plan an example of the documentation required i.e. an example of the **Statement of (dis-) association**.

~~The full WG will revisit paragraphs on need to seek Confirmation in section 1.3.1, 1.3.2 and 1.3.3 as part of stress testing.~~

1.3.2 Impact change of Designated Language

The general policy requirement is that to be considered an IDNccTLD string it must be a Meaningful Representation of the name of the Territory in a Designated Language of the Territory. For this purpose, a **Designated Language** is defined as: a language that has a legal status in the **Territory** or that serves as a language of administration[9].

The IDN ccTLD will be considered de-selected and should be retired if it is evidenced that a selected IDNccTLD string that is either in the validation stage or is delegated as an IDNccTLD is no longer a Meaningful Representation in a **Designated Language** of the **Territory**.

A language is evidenced to be no longer Designated:

- If at the time of the request of the IDNccTLD string the **Designated Language** requirement was demonstrated and verified by a reference to the listing of (part of the) name of the **Territory** in the **Designated Language** in the UNGEGN Manual, the name of the **Territory** is no longer included in the **Designated Language** (see for the relevant **Territory** as an ISO 639 language in Part Three of the "Technical Reference Manual for the standardization of Geographical Names", United Nations Group of Experts on Geographical Names (the UNGEGN Manual) (https://unstats.un.org/unsd/geoinfo/ungegn/docs/11th-uncsgn-docs/E_Conf.105_13_CRP.13_15_UNGEGN%20WG%20Country%20Names%20Document.pdf).

[9] The definition of **Designated Language** is based on: "Glossary of Terms for the Standardization of Geographical Names", United Nations Group of Experts on Geographic Names, United Nations, New York, 2002 https://unstats.un.org/unsd/ungegn/pubs/documents/Glossary_of_terms_rev.pdf . Note that in the Glossary the term "Official Language" is used. Experience has shown that, depending on the specific Territory, "Official Language" has a specific connotation, which sometimes creates confusion with the term "Official Language" as defined in the Glossary.

- If at the time of the request of the IDNccTLD string the **Designated Language** requirement was demonstrated and verified by referencing it as an administrative language for the relevant **Territory** as defined in section 3.7 of ISO 3166-1 standard [2020], the language is no longer referenced as such.

- If the relevant public authority in the **Territory** confirms that the language is no longer used in official communications of the relevant public authority or serves as a language of administration (**Statement of Designation of Language)**

If it is evidenced that a language is no longer a **Designated Language** in the **Territory** the related IDNccTLD string for the name of that **Territory** is considered de-selected and if delegated, the IDNccTLD must be retired.

Confirmation of association or dis-association.
ICANN is not expected to actively seek confirmation of change of status of a language in **Territory**.

However, if ICANN receives a valid request[10] for an IDNccTLD string for a **Territory** which is in the same **Designated Language** as another IDNccTLD string associated with the same **Territory** and the latter is either in the verification process or has been delegated, ICANN shall require a **Statement of Designation of Language** from the requester or IDNccTLD Manager of the IDNccTLD string being verified or delegated (whatever the case may be). The **Statement of Designation of Language** must be provided by a similar relevant public authority that provided the original documentation.

[10] Note this includes documentation of support by the SIP as described in section 2.2 below.

If such a **Statement of Designated Language** cannot be provided within a reasonable time frame 3 months upon notification by ICANN), the IDNccTLD already in process of being verified string or already delegated, is deemed to be de-selected and shall be retired. As of the time a **Statement of Designated Language** is requested until such a time the **Statement** is provided or after the reasonable time frame has passed (whatever is the earliest), the processing of the requested IDNccTLD string for that **Territory** shall be put on hold.

If according to the **Statement of Designated Language** the language remains to be a **Designated Language**, the (second) requested IDNccTLD string in the same **Designated Language** of the **Territory** shall be considered invalid and the requester and the related government should be informed accordingly.

ICANN should include in the implementation plan an example of the **Statement of Designated Language.**

1.3.3 Impact change of script or writing system.

The general policy requirement is only one (1) IDN ccTLD string per Designated Language. In the event that there is more than one **Designated Language** in the **Territory**, one (1) unique IDN ccTLD for each **Designated Language** may be selected, provided the **Meaningful Representation** in one **Designated Language** cannot be confused with an existing IDN ccTLD string for that **Territory**.

Further, where a language is expressed in more than one script in a **Territory**, then it is permissible to have one string per script, although the multiple strings are in the same **Designated Language**. For that matter the documentation to request an IDNccTLD string must include a reference to the script or scripts in which the **Designated Language** is expressed, and which MUST be listed in the script charts of the latest version of UNICODE.

If it is evidenced that in the **Territory** a **Designated Language** is no longer expressed in the script or scripts in which the IDNccTLD string associated with the **Territory** was expressed at the time it was requested, then that IDNccTLD string shall be considered de-selected and if delegated, must be retired.

Confirmation of script to express Designated Language. ICANN is not expected to actively seek confirmation of change of status of the script in which a **Designated Language** in **Territory** is expressed.

However, if ICANN receives a valid request[11] for an IDNccTLD string for a **Territory** which is in the same **Designated Language** as another IDNccTLD string associated with the **Territory** but is expressed in another script, ICANN shall require a **Statement of Referenced Script** from the requester or IDNccTLD Manager of the IDNccTLD string already being verified or delegated (whatever the case may be). The **Statement of Referenced Script** must be provided by a similar relevant public authority that provided the original documentation with respect to the referenced script.

If such a **Statement of Referenced Script** cannot be provided within a reasonable time frame 3 months upon notification by ICANN), the IDNccTLD already in process of being verified string or already delegated, is deemed to be de-selected and shall be retired. As of the time a **Statement of Referenced Script** is requested until such a time the **Statement** is provided or after the reasonable time frame has passed (whatever is the earliest), the processing of the requested IDNccTLD string for that **Territory** shall be put on hold.

[11] Note this includes documentation of support by the SIP as described in section 2.2 below.

If according to the **Statement of Referenced Script** the Designated Language remains to be expressed in the script originally referenced, the (second) requested IDNccTLD string in the same **Designated Language** of the **Territory** shall be considered invalid and the requester and the related government should be informed accordingly.

ICANN should include in the implementation plan an example of the **Statement of Referenced Script.**

1.3.4 Review Mechanism. The Review Mechanism for IFO decisions which apply to ccTLDs is available to the IDN ccTLD Manager who receives a Notification of Retirement under section 1.3.1, 1.3.2 or 1.3.3.

2. Required SUPPORT for IDNccTLD string

2.1 The selected IDN ccTLD string MUST be non-contentious within the Territory. The selected IDN ccTLD string must be non-contentious within the **Territory**. The non-contentiousness is evidenced by a statement of support/endorsement/non-objection by the **Significantly Interested Parties**[12] in the **Territory**.

If during the process for selecting an IDN ccTLD string concurrent requests for the same or more IDN ccTLD strings in the same **Designated Language** for the same **Territory** are submitted, they shall be considered competing requests and are therefore deemed to be contentious within the **Territory**. Before any further steps are taken in the selection process, this issue needs to be resolved in **Territory**, before proceeding with any of the requests. If a concurrent request for an IDNccTLD string is received after the validation of the first requested IDNccTLD string has been completed and the requested IDNccTLD is published (see section 10, below), this second request shall be considered erroneous and section **Change, withdrawal or termination of the request (**section [update nr] below) applies.

[12] The concept Significantly Interested Parties is derived from RFC 1591 and used as detailed in the Framework of Interpretation by the FOIWG (https://ccnso.icann.org/sites/default/files/filefield_46435/foi-final-07oct14-en.pdf) . Accordingly: The FOIWG interprets "Significantly Interested Parties" (section 3.4 of RFC1591) to include, but not be limited to: a) the government or territorial authority for the country or territory associated with the ccTLD and b) any other individuals, organizations, companies, associations, educational institutions, or others that have a direct, material, substantial, legitimate and demonstrable interest in the operation of the ccTLD(s) including the incumbent manager. To be considered a Significantly Interested Party, any party other than the manager or the government or territorial authority for the country or territory associated with the ccTLD must demonstrate that it is has a direct, material and legitimate interest in the operation of the ccTLD(s). The FOIWG interprets the requirement for approval from Significantly Interested Parties (section 3.4 of RFC1591) to require applicants to provide documentation of support by stakeholders and for the IANA Operator to evaluate and document this input for delegations and transfers

2.2. Documentation of required endorsement / support/non-objection for selected string by Significantly Interested Parties

2.2.1 Definition of Significantly Interested Parties. Significantly Interested Parties include but are not limited to:

1. the government or territorial authority for the **Territory** associated with the IDN ccTLD string and
2. any other individuals, organizations, companies, associations, educational institutions, or others in the **Territory** that have a direct, material, substantial, legitimate and demonstrable interest.

To be considered a **Significantly Interested Party**, any party other than the government or territorial authority for the **Territory** associated with the selected IDN ccTLD must demonstrate that it is has a direct, material, legitimate and demonstrable interest in the operation of the proposed IDN ccTLD(s).

Requesters should be encouraged to provide documentation of the support of stakeholders for the selected string, including an opportunity for stakeholders to comment on the selection of the proposed string via a public process. "Stakeholders" is used here to encompass **Significantly Interested Parties**, "interested parties" and "other parties."

2.2.2 Classification of input

For procedural purposes the following cases should be distinguished:

- Request for the full or short name of **Territory** (as defined in Section 3, reference needs to be updated in final version).
- Other cases, where additional documentation is required.

In both cases the relevant Government / Public Authority needs to be involved and at a minimum its non-objection should be documented.

Notes and Observations.
In cases that additional documentation is required:

- Unanimity should NOT be required.
- The process should allow minorities to express a concern i.e. should not be used against legitimate concerns of minorities
- The process should not allow a small group to unduly delay the selection process.

ICANN should include an example of the documentation required to demonstrate the support or non-objection for the selected string(s) in the implementation plan.

2.3 Impact IDNccTLD string becomes contentious within the Territory.

The general policy requirement is that the selected IDN ccTLD string MUST be non-contentious within the **Territory.** The non-contentiousness is evidenced by a statement of support/endorsement/non-objection by the **Significantly Interested Parties (SIP**) in the **Territory**.

If it is evidenced that the selected IDN ccTLD string has become contentious within the Territory, it shall be retired in accordance with the policy for retirement of ccTLDs.

The contentiousness of the IDNccTLD string is evidenced by a statement of the **Significantly Interested Parties** in the **Territory** the IDNccTLD string is contentious (Hereafter: **Statement of De-Selection**).

For purposes of the procedure, The Definition of Significantly Interested Parties (section 2.2.1) and Classification of input (section 2.2.2) apply.

To be effective the **Statement of De-Selection** MUST be published on the ICANN Website. Prior to publication of the **Statement**, the IDNccTLD Manager shall be informed by ICANN of receipt of such a **Statement of De-Selection**.

If a concurrent **SIP** statement in support of the IDN ccTLD string(s) is received by ICANN before the **Notification of Retirement** is provided to the Manager of the de-selected IDNccTLD string, this SIP Statement and the **Statement of De-Selection** shall be deemed to be conflicting within the **Territory**. Before any further steps are taken in the retirement process, this issue needs to be resolved in **Territory**.

If a request for an IDNccTLD string in the same **Designated Language** for the same **Territory** is received at the same time or after the **Statement of De-Selection** is received, but before the date the **Notification of Retirement** is sent, then the issue of contradicting statements with respect to the de-selection of the IDNccTLD string needs to be resolved in **Territory**, before any further steps are taken in the de-selection process of the delegated IDNccTLD string and/or validation process for the newly requested IDNccTLD string.

Notes and observations

ICANN should include in the implementation plan an example of the documentation required to demonstrate the support for the De-Selection of the selected string(s).

2.4 Review Mechanism. The Review Mechanism for IFO decisions which apply to ccTLDs is available to the IDN ccTLD Manager who receives a Notification of Retirement under section 2.3

Section 3 Variant Management

3.1 Notes and Observations

In the Variant Management section the working group will address two questions with respect to (IDN)ccTLDs:

- **How are Variants of the selected IDNccTLD string defined?**
- **How should variants of the selected IDNccTLD string be managed?**

With respect to the first question - the definition of TLD Variants -, the ICANN Board resolved on on 11 Apr. 2013 to implement the Label Generation Rule (LGR) Procedure. The working-group supports implementation of the LGR.

With respect to the second question, the management of IDNccTLD variant, the results of the deliberations of the sub-group are included in section 3 of this document. The sub-working group based its work on the following documents and background material:
The ICANN Board of Directors resolutions:

- approved on 14 March 2019 IDN Variant TLD Recommendations and requested ccNSO and GNSO take into account the recommendations while developing their respective policies to define and manage the IDN variant TLDs for the current TLDs as well as for future TLD applications, and communicate for a consistent solution.
- approved on 26 January 2020 Recommendations for the Technical Utilization of the Root Zone Label Generation Rules and requested the ccNSO and GNSO Councils take into account the Recommendations while developing their respective policies to define and manage the IDN variant TLDs for current TLDs as well as for future TLD applications.

In addition, and to provide an overview to the working group and ensure the coordinated and consistent approach as requested, the sub-group first looked at the IDN Variant TLD Recommendations. In addition, the sub-group looked at the GNSO view on these recommendations and was kept informed about the progress of the GNSO EPDP in this area and the latest SSAC advise in this area (SAC 120).

The working group looked the recommendations on the Technical Utilization of RZ-LGR. Again, first the recommendations as adopted. In addition, the sub-group looked at the GNSO view on these recommendations, if any.

Recommendations or advice.
In the course of its work the working group identified issues that due to the limited policy remit of the ccNSO required further discussion and possibly another way to address then a policy recommendation.

The working group considered that addressing these issue would be needed to ensure stability, security and interoperability of the DNS, but would be outside the remit of the policy. The working group opted therefore to include recommendations as advise to ccTLD managers.

The Policy recommendations pertaining to management of variant IDNccTLDs are contained in section 3-9. The advice to IDNccTLD Managers is contained in Annex C.

3.2 Definition of IDNccTLD Variants

3.2.1 Definition of Variants. Compliance with Root Zone Label Generation Rules (RZ-LGR, RZ-LGR-2, and any future RZ-LGR rules sets) **shall** be required for the generation of an IDNccTLD string and its variants, including the determination of whether the string is **Blocked** or **Allocatable**. IDN TLDs must comply with IDNA2008 (RFCs 5890-5895) or its successor(s).

Notes and Observations

- IDN TLDs must comply with IDNA2008 (RFCs 5890-5895) or its successor(s).
- All selected IDNccTLD strings must be processed using the RZ-LGR:
    - to determine if they are valid and.

- Calculate Variants. Use RZ-LGR to assign status blocked or allocatable.

3.2.2 Scripts integrated into RZ-LGR. For the scripts and writing systems which have been integrated into the RZ-LGR, the RZ-LGR must be the only source for processing the following cases:

- Validate an applied-for TLD string and determine its variant string(s) with corresponding dispositions
- Calculate variant strings, and corresponding disposition values, for each one of the already delegated TLD Strings

Transitional arrangement. Desired Variant String (variants that have been requested under the Fast Track Process) are only eligible if they are generated through RZ-LGR and accordingly allocatable.

3.2.3. Limitation of delegation of variants. Only **Allocatable VARIANTS** of the selected IDNccTLD string that are **Meaningful Representations** of the name of the **Territory** in the **[Designated[13]] Language** according to section 1.1-1.8 and section 2.1 and 2.2**,** are eligible to be delegated.

This criteria shall be subject of the first review of the IDNccTLD string selection policy, as foreseen in Section 9.E Review of policy for the selection of IDN ccTLD strings.[14]

[13] Taking on suggestion to put "designated" between brackets. For later discussion we need to seek input from the Arabic script/language community on what the impact of this limitation would be.

[14] **Section 9.E Review of policy for the selection of IDN ccTLD strings** It is recommended that the policy will be reviewed within five years after implementation or at such an earlier time warranted by extraordinary circumstances. It is also recommended that the the ccNSO Council initiates such a review by launching a review group who will be tasked to review the ascertain whether the policy needs to be updated and advise the ccNSO Council on the proposed method for such an update. The

Notes and Observations

For variants to be eligible for delegation, section 3.2.3 implies that all criteria apply and the required documentation and support from the Significantly Interested Parties must be available for all requested variants before validation. The proposal is attempting to strike a balance between the legitimate need for variants of an IDNccTLD to avoid user confusion and the general responsibilities for the security and stability of the root by the need to limit proliferation of strings at the root level.

3.2.4. Impact of possible amendment of RZ-LGR. It is expected that the RZ-LGR be revised throughout its lifecycle, because a new script LGR is being integrated or a revision of an existing script LGR is being integrated into the Root Zone LGR. There may be a case where the update in the Root Zone LGR does not support an existing IDN ccTLD. In such a case, the delegated IDN ccTLD(s) must be grandfathered.

Notes and observation

Section 3.2.4 is on impact of possible amendment of the RZ-LGR. Assuming that an amendment would demonstrably threaten the stability and security of the DNS, de-selection and hence retirement of the IDNccTLD string and/or its delegated variants may be the only measure. According to the ccTLD retirement policy, the retirement may take at least five (5) years. and is not governed by this policy but by the retirement policy. As a result the threat to the DNS will remain during this period of retirement and prior to the removal for the DNS Root zone file.

scope and working method of such a review must be determined by the ccNSO after consulting relevant stakeholders, and take into account the experience with the ccPDP4 process and relevant circumstances and developments with respect to IDN TLDs

In the event such a review results in a recommendation to amend the policy, the rules relating to the country code Policy Development Process as defined in the ICANN Bylaws should apply.

In addition, changes to the RZ-LGR take into account external influences and only become effective after an extensive public consultation. This public consultation provides opportunities to the community to advise of the potential threat caused by the proposed change of the RZ-LGR.

3.3 Allocation of Variant Top Level Domain strings to the same entity

Allocatable IDNccTLD variant strings. The set of allocatable variant strings that is generated from the selected IDNccTLD string by applying the RZ-LGR, must be

- allocated to one and the same entity: the requestor (the entity that submits the selected IDNccTLD string),
- delegated to one and the same entity: the IDN ccTLD Manager or withheld for possible future delegation to the IDNccTLD Manager.

In other words, for a selected top-level label T1, its allocatable variant label(s) T1V1,…, T1Vx shall only be allocated to the IDN ccTLD requestor, or - after the delegation process for the selected IDNccTLD string has been intitated - delegated to the same IDNccTLD Manager or withheld for possible delegation to that IDNccTLD Manager.

If a specific IDNccTLD is operated by a ”back-end” registry service provider under arrangement with the IDNccTLD Manager, or will be operated by a “back-end” registry service provider under arrangement with the IDNccTLD Manager, then that “back-end” service provider must operate all delegated variants of that specific IDNccTLD as well.

3.4 According to section 3.2.1 and 3.2.2 Variants of the selected sting are derived from and directly related to the selected IDNccTLD through the RZ-LGR, in other words, if there is no selected IDNccTLD then ther are no variants.

As a result, and general rule, the de-selection of Selected IDNccTLD string must result in de-selection of its variant strings. However, this proposed policy does provide for a specific exemption on this general rule: If a Selected IDNccTLD is de-selected as result of the lack of support by the SIP (see section 3.2.2) then a Delegated Variant may continue if continuation is explicitly supported by the SIP (see section on deselection by SIP).

3.4 Moved to section 9 E[E]

3.5 NEW Transitional Arrangement-Requesting variants of already selected IDNccTLD strings

Under the Fast Track Process a requestor could not request any variants. Only after a script has been integrated into the RZ-LGR, variants can be calculated and hence applied for. According to Principle IV the request for (and delegation) of IDNccTLDs, is an ongoing process.

It is implied in the Fast Track Process Implementation Plan (FIP) (section 3.4) and section 3.2.2 of this proposed policy that variants can be requested after the selected string was delegated (including Delegatable variants of IDNccTLD strings that were delegated under the Fast Track Process). However, as implied in section 3.4 of the Fast Track Implementation Plan IP, and 3.2.2 above, a variant is only valid if at the time of application it is valid according to the RZ-LGR.

Therefore, if according to the RZ-LGR at the time of submission of the application the variant of a selected IDN ccTLD string is an allocatable variant of that IDNccTLD string it is considered to be “valid” under the RZ-LGR, and eligible assuming all other criteria are met..

If according to the RZ-LGR at the time of submission of the application of IDN ccTLD string the requested variant is a blocked variant of the selected IDNccTLD string, it is deemed to be “not valid” and therefore not eligible.

Finally, it is noted that there is an expectation that the requester and relevant community using the script in which the IDN ccTLD string is expressed, will have participated in the related script generation panel. This would have allowed the requester and Significantly Interested Parties to build an alternative case with respect to variant strings and its variants.

Section 4 TECHNICAL & OTHER STRING REQUIREMENTS AND THEIR VALIDATION

4.1.1 Technical Criteria

The requested selected IDN ccTLD string and its requested variants must abide by all Technical Criteria for an IDN TLD string. In addition to the proposed general requirements for all labels (strings), the selected IDN ccTLD string MUST abide by the normative parts of RFC 5890, RFC 5891, RFC 5892 and RFC 5893.

All selected IDNccTLD strings must be processed using the RZ-LGR to determine:

1. if they are valid and
2. Calculate Variants (e.g use the RZ-LGR to determine whether the variant string is blocked or allocatable).

If the RZ-LGR is applied to the selected IDNccTLD string (for a script used to express the meaningful representation in the Designated Language), and this results in variant ASCII string (Any combination of two ISO 646 Basic Version (ISO 646-BV) characters[15] (2-letter [az] codes), these variants be:

- Blocked and
- Result in not allowing the selected IDN ccTLD (to maintain the predictability of the current ccTLD delegation policy

For the scripts and writing systems which have been integrated into the RZ-LGR, the RZ-LGR must be the only source for processing the following cases:

- Validate a requested IDNccTLD string and determine its variant string(s) with corresponding dispositions
- Calculate variant strings, and corresponding disposition values, for each one of the already delegated TLD Strings

[15] Also known more commonly as ASCII. Note however that ASCII is a term that may describe various character sets: see https://en.wikipedia.org/wiki/ASCII (Reference updated following discussion 28 March 2023)

All applicable technical criteria (general and IDN specific) for IDN ccTLD strings should be documented as part of the implementation plan. For reasons of transparency and accountability they should be made public prior to implementation of the overall policy and endorsed by the ccNSO.

Validation that a string meets the technical criteria is a process step and shall be conducted by an external, independent panel. The recommended procedure is described in Section 2.1.3, Processes and Documentation.

The method and criteria for the technical and RZ-LGR conformity validation should be developed as part of the implementation plan and are a critical part of the review process. For reasons of transparency and accountability they should be made public prior to implementation of the overall policy and endorsed by the ccNSO.

4.1.2 Conformity to RZ-LGR (was section 5.4.2)

At the time the selected IDNccTLD string is submitted for validation, the script in which the selected IDNccTLD string is expressed must be in compliance with the RZ-LGR i.e. the Label Generation Rules (LGR) for the script/writing system in which the Designated Language is expressed must be integrated in the Label Generation Rules for the Root Zone.

If at the time the requested IDNccTLD string is submitted for validation the LGR for the writing system or script in which the Designated Language is expressed has not been generated or is not yet integrated in the RZ-LGR, or if the selected IDNccTLD string is not in compliance with the RZ-LGR, ICANN shall inform the requester and section 5.2.2 sub C. applies accordingly.

The risk of selecting a potential " invalid" string should remain with the selecting parties and hence no review mechanism is necessary for this aspect of the process. Therefore, if a selected IDN ccTLD string - of which the script is supported by the RZ-LGR - is determined to be "invalid" according to the RZ-LGR, it shall not pass the string evaluation phase and section 8 below (termination of the process) shall apply accordingly.

4.2. Confusing Similarity

4.2.1 Goal Confusing Similarity validation.

The goal of the confusing similarity validation is to minimize **the risk to the stability and security of the DNS due to user confusion by exploiting potential visual confusing similarity between domain names (eg.** be **in Latin script vs** бе **in Cyrillic)** As such confusing similarity should therefore be minimized and mitigated. The risk of visual confusing similarity is not a technical DNS issue, but can have an adverse impact on the security and stability of the domain name system.

Notes and Observations

The rule on confusing similarity originates from the IDNC WG and Fast Track Implementation Plan and was introduced to minimize the risk of confusion with existing or future two letter country codes in ISO 3166-1 and other TLDs. This is particularly relevant as the ISO 3166 country codes are used for a broad range of applications, for example but not limited to, marking of freight containers, postal use and as a basis for standard currency codes.

The risk of string confusion is not a technical DNS issue, but can have an adverse impact on the security and stability of the domain name

system, and as such should be minimized and mitigated[16].

The method and criteria used for the assessment cannot be determined only on the basis of a linguistic and/or technical method of the string and its component parts, but also needs to take into account and reflect the results of scientific research relating to confusing similarity, for example from cognitive neuropsychology[17].

4.2.2 Standard for visual similarity.

A selected IDN ccTLD string is considered confusingly similar with one or more other string(s) (which must be either Valid-U-labels or any a combination of two or more ISO 646 BV characters) if the appearance of the selected string in common fonts in small sizes at typical screen resolutions is sufficiently close to one or more other strings so that it is probable that a

[16] Some members of the WG question whether the risks associated with confusing similarity of (cc) TLDS is an issue and if so, whether it that needs to be addressed through the policy. With respect to the latter It is noted that it would introduce a distinction between IDNccTLDs and ASCII ccTLDs. In addition, it can be questioned whether invalidating a selected IDN ccTLD is the most appropriate and optimal mitigation measure. At the same, it is noted that as a result the chances of misconnection are diminished.

[17] See for example,

- M. Finkbeiner and M. Coltheart (eds), Letter Recognition: from Perception to Representation. Special Issue of the Journal *Cognitive Neuropsychology*, 2009 and:
- Simpson, Ian; Mousikou, Petroula; Montoya, Juan; Defior, Sylvia, A letter visual-similarity matrix for Latin-based alphabets, Behavior Research Methods; June 2013, Vol. 45 Issue 2, p431
- Shane Mueller, Cristoph Weidemann, Alphabetic letter identification: Effects of perceivability, similarity, and bias, Acta Psychologica 139, (2012)
  The last two studies were used as basis for the review methodology of the Extended Process Similarity Review.

reasonable Internet user who is unfamiliar with the script would perceive the strings to be the same or confuse[18] one for the other[19].

4.2.3 Base for comparison Confusing Similarity of IDN ccTLD Strings.

Notes and Observations

With the introduction of variants one of the issues in the context of confusing similarity is to delineate the scope of the base for comparison for the confusing similarly validation process, as this scope could expand exponentially. For example, as part of the confusing similarity review a selected IDNccTLD string needs to be compared with the string "Pakistan" in the Arabic script. Applying this to the base of comparison the scope of the validation could expand to over 1200 strings (assuming all allocatable and blocked variants of "Pakistan" in the Arabic script are included).

The base for comparison is understood to mean the set of requested strings (Request Side) that will have to be compared with the set of potential visual confusingly similar strings (Comparison Side).

Therefore delineating the scope of the base for comparison effectively means delineating the scope of the Request Side and the Comparison Side.

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[18] Please note that with respect to confusabilaty SSAC emphasized in SAC089, which is a response in the context a proposals to amend the Fast Track EPSRP process (see: https://ccnso.icann.org/en/workinggroups/epsrp.htm) that:

"Confusability cannot be considered in isolation from other issues related to security. Phishing and other social engineering attacks based on domain name confusion are a security problem for end users. As such, adding a label to the root zone that is potentially confusable violates the Inclusion Principle's requirement that a TLD label be known to be 'safe'."

Note that SSAC's response and considerations were subsumed in and overtaken by the joint ccNSO-SSAC Statement to the ICANN Board form August 2017 (https://ccnso.icann.org/sites/default/files/field-attached/epsrp-final-response-17aug17-en.pdf)

[19] Based on Unicode Technical Report #36, Section 2: Visual Security Issues

As stated proper delineation is needed for the following reasons:

- **Scalability -** The scale of the visual similarity review will have to be manageable as it is assumed that the confusing similarity reviews have to done manually in the upcoming years. Without proper limitation, the review may become to resource intensive and/or long in duration, which may additional issues, for example around predictability.

- **Avoiding unforeseen and/or unwanted side effects.** If the full set of blocked variants of a would be included in the Comparison Side, a requested selected IDNccTLD could be "invalid" and further processing terminated although the variant string included in the Compare Side is from another script, and co-mingling of scripts is not allowed. In other words, the comparison may include strings/labels, which are not allowed under policy. If a string is comprised of or contains blocked variants it will never be delegated.

- **Likelihood of Misconnection-** Taking into account the goal of the confusing similarity validation, to minimize **the risk to the stability and security of the DNS due to user confusion by exploiting potential visual confusing similarity between domain names (eg.** be **in Latin script vs** бе **in Cyrillic)** the confusing similarity validation process is focused on the avoidance **MISCONNECTION** resulting from visual similarity of strings.

  In SAC 060, SSAC advised ICANN (i.e the policy making bodies) that *should they decide to implement safeguards to deal with failing user expectations due to the introduction of variants, a distinction should be made between two types of failure modes:* ***no-connection*** *versus* ***misconnection*** *(emphasis added)"*

  No-connection may be a nuisance for the user, like a typo, however misconnection may result in the exploitation of the user confusion and this could be avoided though the similarity review.

  Therefore the confusing similarity review is about minimizing the risk i.e likelihood of misconnection. As stated the confusing similarity validation is about the avoidance of MISCONNECTION and related harm. For MISCONNECTION to arise it "*must be*

probable, not merely possible that confusion will arise in the mind of the average, reasonable Internet user. Mere association, in the sense that the string brings another string to mind, is insufficient to find a likelihood of confusion.[20]*"*

NO CONNECTION is possible because of confusing similarity, but also for other reasons and is a nuisance, but avoiding no connection is not the purpose of the similarity validation process.

4.2.3.A Delineating the Scope of Request Side

The primary question to determine the scope of the Request Side is which set of variants should be taken into consideration when considering a request for a selected string and requested Delegatable variants?

Note that according to section **3.2.3. Limitation of delegation of variants** above, only a selected string and its requested Delegatable variants are eligible. However, the set of strings to consider could be:

1. Only the selected string and the requested Delegatable variants
2. The selected string and **all Delegatable** variants
3. The selected string and **all Allocatable variants** of the selected string, or
4. The selected string and **all variants (Allocatable and Blocked)**

Proposed Request Side. The request side for the Base for Comparison is comprised of and should be limited to:

- Selected string, and

[20] The standard from the Fast Track Process (page 24, https://www.icann.org/en/system/files/files/idn-cctld-implementation-plan-28mar19-en.pdf)

- Requested Delegatable variants (only those allocatable variants, which are a meaningful representation of the name of the territory in the designated language and related script and requested at the time of submission of the request)

Notes and Observations

Rationale

1. The IDN selection process is open and ongoing. Variants may be requested any time as long as they meet all criteria, including meaningfulness.
2. The focus should be minimizing the risk of Misconnection to minimize and/or mitigate harm.
   Abstracting from variants, if the selected string "X X" is considered confusingly similar with the string "*xx* ", which belongs to the pool of:
   - Any combination of two ISO 646 Basic Version (ISO 646-BV) characters[21] (letter [a-z] codes),
   - Existing TLDs or reserved names.
   - Proposed TLDs which are in process of string validation

   The potential misconnection results from this confusing similarity between "X X" and "*xx"* and for that reason "X X" is deemed to be invalid and processing under the policy will end.
3. From a technical point of view each selected string and all its variants should be viewed as separate TLDs the selected sting "X X" and its Delegatable variants should be viewed as separate TLDs. Therefore each of the requested strings should be reviewed on confusing similarity.
4. As IDNccTLD process is open and at a later stage additional Delegatable variant strings may be requested (for example variants of already delegated IDNccTLD under the Fast Track process). Each of these requested variants of an already delegated selected string, should be reviewed at its own merits with respect to confusing similarity and the other requirements.

[21] International Organization for Standardization, "Information Technology – ISO 7-bit coded character set for information interchange," ISO Standard 646, 1991

4.2.3.B Delineating the Scope of Comparison Side.

Minimal scope of comparison side. Re-iterating, the goal of the confusing similarity validation: The goal is to minimize **the risk to the stability and security of the DNS due to user confusion by exploiting potential visual confusing similarity between domain names** or to paraphrase in terms of SAC 060 (*Examining the User Experience Implications of Active Variant TLDs)* the goal is to minimize the risk of MISCONNECTION due to visual confusability of two strings.

The minimum scope of the Comparison Side - before the introduction of variants - was[22]:

- Any combination of two ISO 646 Basic Version (ISO 646-BV) characters[23] (letter [a-z] codes), nor
- Existing TLDs or reserved names.
- Proposed TLDs which are in process of string validation.

After the introduction of the variants, the minimum set of strings in the Comparison Side, needs to be defined as:

- Any combination of two ISO 646 Basic Version (ISO 646-BV) characters[24] (letter [a-z] codes),
- Existing TLDs, which shall also include the already delegated variants of the selected string or primary label and of reserved names.
- Proposed TLDs which are in process of string validation and their requested Delegatable or requested variant labels (however defined under the ccTLD and gTLD processes)

[22] See section 5.5 String Confusion and Contention Fast Track Implementation Plan (https://www.icann.org/en/system/files/files/idn-cctld-implementation-plan-28mar19-en.pdf)

[23] International Organization for Standardization, "Information Technology – ISO 7-bit coded character set for information interchange," ISO Standard 646, 1991

[24] International Organization for Standardization, "Information Technology – ISO 7-bit coded character set for information interchange," ISO Standard 646, 1991

Secondly, it is proposed that the Similarity Evaluation Panel should determine which additional variants of the basic set of strings should be included in the Comparison Side, factoring in:

- **The likelihood of misconnection**
- **Scalability**, and
- **Unforeseen and/or unwanted side effect.**

In its report, the Panel has to provide its reasoning for its determination, whether or not to include additional variants of the basic set of strings were included in the comparison side and if so, which (see section 5.5.2.1.3, update reference)

Notes and Observations section 4.1.2.3 & 4.1.2.4

With respect to the minimal scope of the comparison side it is noted that is includes all strings that:

1. Should never be delegated under any existing policy (the reserved names),
2. Should always be Delegatable because of other existing policy (ASCII two-letter country-code TLDs, RFC 1591)),
3. Have been delegated (existing TLDs and their delegated variants), and
4. Are in the process of validation at the time the request for the selected IDNccTLD and its requested Delegatable variants was submitted. This would include the variants of the selected IDNccTLD strings and new gTLD labels and their requested variants.

Rationale - By definition variants of a selected IDNccTLD string or primary label are derived from the string or label through the RZ-LGR and are considered to be (visual) similar to the selected or primary string/label from the perspective of the community using the script. With respect to allocatable variants it is *"probable, not merely possible that confusion will arise in the mind of the average, reasonable*

Internet user. Mere association, in the sense that the string brings another string to mind, is insufficient to find a likelihood of confusion.[25]*"*

With respect to including blocked variants in the comparison side of the base for comparison - again - by definition BLOCKED variants of a selected IDNccTLD string or primary label are derived from the string or label through the RZ-LGR and are considered to be (visual) similar to the selected or primary string/label from the perspective of the community using the script. Therefore blocked variants should be taken into considerations. However, depending on the script, and the requested selected IDNccTLD string and/or requested Delegatable variant(s), the likelihood of confusing similarity of the requested string and variants with blocked variants and hence MISCONNECTION will vary – ranging from very probable to maybe possible.

As noted with the example of "Pakistan" in Arabic, according to the relevant LGR, 1200 blocked variants have been identified. Checking against such a number manually is unscalable.

Therefore suggesting a procedural approach, taking into account **Scalability**, **Likelihood of MISCONNECTION** and **Unforeseen and/or unwanted side effect** is warranted with respect to the visual confusion validation of selects IDNccTLD strings and the requested Delegatable variant IDNccTLD strings.

[25] The standard from the Fast Track Process (page 24, https://www.icann.org/en/system/files/files/idn-cctld-implementation-plan-28mar19-en.pdf)

Section 5. Detailed aspects String Validation Stage

5.1 Procedures for the submission of the selected string and related documentation

This part of the process is considered a matter of implementation.

Notes and Observations

To limit surprises and to assist parties with their submission, ICANN is advised to provide information , including pointing to tools to self-evaluate the requested string, prior to the submission. However, these tools and information shall never replace the assessment by the various panels.

5.2 Administrative Validation of selected string

a. ICANN staff validation of the request

After the requester has submitted a request for an IDN ccTLD string, ICANN should at least validate that:

- The selected IDN ccTLD refers to a **Territor**y
- The selected string (A-label) does not exist in the DNS, nor is approved for delegation to another party,
- The selected string (U-label) contains at least one (1) non-ASCII character.
- The required A-label, U-label, and corresponding Unicode points to designate the selected IDN ccTLD string are consistent.
- Documentation on **Meaningfulness** is complete and meets the criteria and requirements.
- Documentation on the **Designated Language** is complete and meets the criteria and requirements.
- Documentation to evidence support for the selected string is complete and meets the criteria and requirements and is from an authoritative source.

If one or more elements listed are not complete or deficient, ICANN shall inform the requester accordingly. The requester should be allowed to provide additional information, correct the request, or withdraw the request (and potentially resubmit at a later time). If the requester does not take any action within 3 months after the notification by ICANN that the request is incomplete or contains errors, the request may be terminated by ICANN for administrative reasons and in accordance with section 8 below.

If all elements listed are validated, ICANN shall notify the requester accordingly and the Technical and Confusing Similarity Validation Process will be initiated (see section 5.3 below).

If ICANN staff anticipates issues pertaining to the Technical and String Confusion Review during its initial review of the application, ICANN staff is advised to inform the requester of its concerns. The requester will have the opportunity to either:

1. Change the selected string,
   or
2. Tentatively request two or more strings as part of the application including a ranking of the preference to accommodate the case where the preferred string is not validated,
   or
3. Withdraw the request,
   or
4. Continue with the request as originally submitted.

Details of the verification procedures and additional elements, such as the channel of communication, will need to be further determined. This is considered a matter of implementation.

Notes and Observations

During the development of the policy the need for a review of ICANN decisions listed in section 5.2 was extensively considered. The general conclusion was that The decisions listed pertain to the validation of specific aspects of a IDNccTLD application i.e. whether or not a listed requirement is met (validated).

The WG made the following observations:

- The validation procedure includes a mechanism for dialogue before a final decision becomes definite.
- ICANN is advised to make use of this mechanism to avoid mistakes and/or to clarify its initial, tentative findings to allow the applicant to adjust the application if necessary.
- The validation by ICANN is first and foremost an administrative check
- Finally, the same application could be resubmitted pointing out there was a mistake.

With respect to the specific validation steps the following was noted:

- The selected IDN ccTLD refers to a **Territor**y

ICANN Org is expected to validate that the Territory to which the IDNccTLD string refer(s), is included as a country, a subdivision, or other area of particular geopolitical interest listed in Section 3 of the 'International Standard ISO 3166, Codes for the representation of names of countries and their subdivisions – Part 1: Country Codes' [ISO 3166-1:2020] or, in some exceptional cases, e.g. grandfathered-in delegations, a country, a subdivision, or other area of particular geopolitical interest listed for an exceptionally reserved ISO 3166-1 code element (See Principle I).

The WG Considered this a completely administrative check AND should not be subject to review

- The selected string (A-label) does not exist in the DNS, nor is approved for delegation to another party,

- The selected string (U-label) contains at least one (1) non-ASCII character.
- The required A-label, U-label, and corresponding Unicode points to designate the selected IDN ccTLD string are consistent.

These validation decisions are considered factual, objective statements and should not be subject to a review.

- Documentation on **Meaningfulness** is complete and meets the criteria and requirements.

This requirement for validation refers to the requirements listed in section 1.2.**5** (Documentation of the meaningfulness of the selected IDN ccTLD string). Specifically it needs to be validated that the required documentation is included in the application and meets the requirements listed in section 1.2.5.
This validation decision is considered factual, objective statement. ICANN is not expected and should not be put int the position to decide whether a selected string is a meaningful representation of the name of a territory. Therefore there is no need for a review.

- Documentation on the **Designated Language** is complete and meets the criteria and requirements.

This requirement for validation refers to the requirements listed in section 1.2.7 (Documentation Designated Language).
This validation decision is considered a factual, objective statement. ICANN is not expected and should not be put int the position to decide whether a language is a designated language as defined (section 1.2.7). Therefore there is no need for a review.

- Documentation to evidence support for the selected string is complete and meets the criteria and requirements and is from an authoritative source.

This requirement for validation refers to the requirements listed in section 2.1 (Required SUPPORT for IDNccTLD string) and 2.2 (Documentation of required endorsement / support/non-objection for selected string by Significantly Interested Parties).

This validation decision is considered a factual, objective statement: the documentation provided evidences support/endorsement/non-objection by the Significantly Interested Parties. In case this requirement is not met ICANN is expected to inform the applicant accordingly and

request additional information if deemed necessary. ICANN is not expected and should not be put in a position to decide whether an IDNccTLD is supported by the Significantly Interested Parties. When in doubt the applicant should provide additional documentation within a specified, reasonable timeframe. Therefore there is no need for a review.

5.3 TECHNICAL, RZ-LGR and SIMILARITY Validation

The Details for the TECHNICAL, RZ-LGR and SIMILARITY Validation process are considered a matter of implementation, taking into account and building on the proposals below under section 5.3.1 – 5.7.6. With respect to the TECHNICAL, RZ-LGR and SIMILARITY Validation it is noted that the procedures and Guidelines that were developed under the IDNccTLD Fast Track Implementation Plan, provide a tested and operational example.

Notes and observations

One of the factors that was extensively discussed was whether the similarity Evaluation Panel is expected to a standing panel. The WG noted that over time (since 2009) the number of IDNccTLD applications has declined. The WG also noted that maintaining a standing panel is very costly. Therefore, whether or not to appoint a standing panel, or use another method for establishing a panel of independent panelist, and optimal number of panelists, is considered a matter of implementation. The WG recognizes various factors, such as the operational implications and expenditures related to the panels, need to be taken into account to find an optimal solution. The WG also believes that finding such a solution is a matter of implementation.

The WG also notes that implementation details have been developed, tested and reviewed and updated as part of the IDNccTLD Fast Track Process. It is therefore suggested that like this policy itself is based and takes into account the criteria and procedures developed under the Fast Track Process, the TECHNICAL, RZ-LGR and SIMILARITY Validation process will follow the process as developed under the Fast Track Process[26]

[26] The Relevant documents in this context are:

- Fast Track Process: https://www.icann.org/en/system/files/files/idn-cctld-implementation-plan-28mar19-en.pdf

The WG also notes that under the Fast Track Process the "Technical Panel" and "Similarity Evaluation Panel" were combined under the function of the DNS Stability Panel. Whether in future, under the ccPDP4 policy, the two Panels will be combined is a matter of implementation.

5.3.1 General description of Technical and SIMILARITY validation

The goal of the Technical, RZ-LGR and Similarity Validation is to provide external and independent advice to the ICANN Board whether a selected string and/or its requested Delegatable variant(s) meet(s) the required technical and RZ-LGR criteria and is/are not considered to be confusingly similar.

If according to the final, definite outcome of the validation a selected string does not meet one or more of the technical criteria or RZ-LGR and/or is considered confusingly similar to another string, the requested IDNccTLD string is/ are deemed to be invalid and not eligible under this policy.

It is recommended that ICANN appoint the following external and independent Panels:

- **Technical Panel.** To validate the technical requirements under this policy are met (section 4.1.1) , a "Technical Panel[27]" shall be appointed to conduct a technical evaluation of the selected IDN ccTLD string.

- Guidelines for the Extended Process Similarity Review Panel for theIDn ccTLD Fast Track Process: https://www.icann.org/en/system/files/files/epsrp-guidelines-04dec13-en.pdf
- Guidelines Risk Mitigation Appraisal: https://www.icann.org/en/system/files/files/guideline-risk-mitigation-measures-evaluation-28mar19-en.pdf
- GAC Advice on IDN ccTLD - ICANN44 Prague Communique: https://gac.icann.org/contentMigrated/icann44-prague-communique

[27] Or any other name ICANN would prefer.

- **Similarity Evaluation Panel.** To validate a string for string similarity, ICANN shall appoint an external and independent "Similarity Evaluation Panel" (Hereafter: SEP). The SEP shall conduct the Confusing Similarity evaluation of the string, including the determination of the scope of the Comparison Base.

  The confusing similarity validation process is by definition subjective in nature. Therefore to determine the scope of the Comparison Side the Panel is expected to include at least one person who is familiar with the script in which the selected string is expressed.

  Notes and observations
  The person who is familiar with the script in which the selected string is expressed could for example be a member of LGR team for the script in which the requested string(s) is/are expressed.

  Such a person should preferably be added to the Panel at or around the time the IDNccTLD string is submitted for validation, however in any case before the Panel will start with the validation procedure.

- **Similarity Review Panel.** To allow for a final confusing similarity validation an external and independent Similarity Review Panel (Hereafter: SRP) shall be appointed when a review is requested by the IDNccTLD requester, to validate that the selected IDN ccTLD string is not confusingly similar.

  Due to the specific nature of confusing similarity and its inherent subjective assessment, the findings of the "SEP" are reviewed by, an external and independent SRP, but only upon request by the IDN ccTLD string requester. This SRP review of the requested IDNccTLD string is expected to use a different assessment framework. The "Similarity

Review" is considered a specific review mechanism, not to be confused with the general ccTLD Review Mechanism. It is expected that this Panel will not include members from one of the other Panels called for under this policy.

- **Risk Treatment Appraisal Panel.** To allow for an appraisal of the risk mitigation treatment if either or both the SEP and/or SRP have found that the requested string to be confusingly similar an external and independent Risk Treatment Appraisal Panel (Hereafter: RTAP) shall be appointed, when such an appraisal is requested by the IDNccTLD requester.

5.3.2 Procedures for Technical Validation & RZ-LGR validation

1. After completion of the ICANN staff validation of the request (see Section 5.2 above), ICANN staff will submit the selected IDN ccTLD string to the "Technical Panel" for the Technical & RZ-LGR validation.
2. The Technical Panel conducts a technical string evaluation of the string and its variants submitted for evaluation. If needed, the Panel may ask questions for clarifications through ICANN staff.
3. The results of the evaluation will be reported to ICANN staff. In its report the Panel shall include the names of the Panelists and document its findings, and the rationale for the decision.

After being constituted, the Panel is expected to complete its evaluation and send its report to ICANN staff within 30 days after receiving the IDN ccTLD string to be evaluated. In the event the Panel expects to need more time, and ICANN staff should be informed accordingly. ICANN staff shall then inform the requester.

If according to the technical validation the selected IDN ccTLD string, and requested variants, if any, meet(s) all the technical criteria, the string is technically validated. If the selected IDNccTLD string fails to meet the technical criteria, the requested string and the requested variants, if any, is/are not valid under the policy.

If according to the technical review the selected IDN ccTLD string meets all the technical criteria, but one or more of the requested variants does not meet the technical criteria, only the requested variants that do not meet the technical criteria are not valid under the policy.

ICANN staff shall inform and notify the requester accordingly and section 8 below applies.

> *Notes and Observation.*
> If the selected IDN ccTLD string does not meet the technical criteria, ICANN org and the requestor are strongly advised to jointly and cooperatively review the results, including the manner in which the relevant RZ-LGR has been implemented with the goal to clarify any issues. However, if after such a review the selected string remains to be determined "invalid", the selected IDNccTLD string shall not pass.

5.4 Procedures for confusing similarity validation

Introduction. As part of the validation process, external and independent advice to the ICANN Board is provided whether a selected string is not considered to be confusingly similar.

If according to the Confusing Similarity Validation, the selected IDNccTLDs string and/or its requested Delegatable variant(s) is/are considered confusingly similar, the requested IDN ccTLD string(s) is/are not valid and hence not eligible under this policy.

To validate that the string(s) are not considered to be confusingly similar, the validation process includes the following procedures:

- **Similarity Evaluation.** The Similarity Evaluation is detailed in section 5.4.2 below.

- **Similarity Review.** The Similarity Review is detailed in section 5.4.3 below.

- **Risk Treatment Appraisal Procedure.** The Risk Treatment Appraisal is detailed in section 5.4.4 below

5.4.2 Similarity Evaluation - Procedural aspects

5.4.2.1 After submission of the requested IDNccTLD string(s) ICANN staff shall submit the selected IDN ccTLD string to the Similarity Evaluation Panel (SEP) for the confusing similarity string evaluation.

Notes and Observation
It is expected that the requested IDNccTLD string(s) will be submitted to the SEP at the time or after completion of the Technical validation, depending on how ICANN will structure the validation procedures and panels.

5.4.2.2 The Panel shall conduct a confusability string evaluation of the string(s) submitted for evaluation. The Panel may ask questions for clarification through ICANN staff.

5.4.2.3 The results of the evaluation will be reported to ICANN staff. In the report the Panel will include the names of the Panelists, document the decision and provide it's rationale for the scope of the Comparison Side and the decision (see section **4.2.3.B)**.

Where the string is considered to be confusingly similar the report shall at a minimum include a reference to the string(s) to which the confusing similarity relates and examples (in fonts) where the panel observed the similarity

ICANN staff shall inform and notify the requester accordingly.

Notes and observation

Under Fast Track Process the DNS Stability Panel will conduct its review and send its report to ICANN staff within 30 days after receiving the IDN ccTLD string to be evaluated. In the event the Panel expects it will need more time, ICANN staff will be informed and ICANN staff informs the requester accordingly. It is the expectation that under this policy the duration of evaluation by the SEP form submission to reporting will be in same order (approximately one month) and the SEP will inform ICANN staff if it needs more time. It is also expected that ICANN staff will inform the requester accordingly.

5.4.2.4 Results of the Similarity Evaluation

5.4.2.4.1 If according to the evaluation, the Panel does not consider the requested string(s) to be confusingly similar, the selected IDN ccTLD is validated.

5.4.2.4.2 If according to the evaluation by the Panel the selected or one or more Delegatable variant IDNccTLD string presents a risk of string confusion with a (variant) (IDN)ccTLD string, which is associated with the same

Territory as the requested IDNccTLD string(s), this should be noted in the report. ICANN staff shall inform the requester accordingly.

If, within 3 months of receiving the report the requester shall confirm that:

(i) The intended manager and intended registry operator for the IDN ccTLD and the ccTLD manager for the confusingly similar country code are one and the same entity; and

(ii) The intended manager of the IDN ccTLD shall be the entity that requests the delegation of the IDN ccTLD string; and

(iii) The requester, intended manager and registry operator and, if necessary, the relevant public authority, accept and document that the IDN ccTLD and the ccTLD with which it is confusingly similar will be and will remain operated by one and the same manager, and

(iv) The requester, intended manager and registry operator and, if necessary, the relevant public authority agree to specific and pre-arranged other conditions with the goal to mitigate the risk of user confusion as of the moment the IDN ccTLD becomes operational;

then the IDN ccTLD string is deemed to be valid.

If either the requester, intended manager or the relevant public authority do not accept these pre-arranged conditions within 3 months after notification or at a later stage refutes the acceptance, the IDN ccTLD shall not be validated.

Alternatively, the requester may defer from this mechanism and use the review or risk mitigation procedure described below.

5.4.2.4.3. a If according to the evaluation the selected IDNccTLD string and/or the requested Delegatable variant(s) is/are found to present a risk of string confusion, ICANN staff shall inform the requester, taking into account section 8 below.

The requester may call for a Similarity Review or RIsk Mitigation Appraisal and provide additional documentation and clarification referring to aspects in the report of the Panel. The requester should notify ICANN within three (3) calendar months after the date of notification by ICANN, and include the additional documentation. After receiving the notification from the requester, ICANN staff shall call on the Similarity Review Panel (SRP) or RTAP Panel.

However, If the selected IDNccTLD is not valid, all related variant strings are invalid.

Notes and Observations
Rationale: The selected string is considered the primary string. All Delegatable variants strings are derived from this string through the RZ-LGR. So if this string is considered invalid, all derived strings should be invalid as well.

It is noted that if the selected string is not valid, but a Delegatable variant IDNccTLD string is valid, this string could be considered the selected IDNccTLD string, and pass. To avoid unnecessary administrative burden by renewed submission, which is always possible, ICANN is advised to accept a note confirmation that one of the Delegatable IDNccTLD strings that is valid, is deemed to be the selected IDNccTLD string. The note of confirmation shall need to be supported by the Significantly Interested Parties that support the original request.

5.4.2.4.3 b. Further, if the selected IDNccTLD is NOT considered confusingly similar and one or more requested Delegatable variants are considered confusingly similar only the requested Delegatable variant that is considered confusingly similar, is considered invalid.

Notes and Observations
In case the requested Delegatable variants are considered confusingly similar with already delegated selected string and/or requested Delegatable variants and all are associated with the same Territory and in the same Designated Language, section 5.4.3.3 applies.

Rationale: By definition Delegatable variants are derived through the RZ-LGR from the selected IDNccTLD, which is considered the core or primary string. So although the core or primary string is considered valid, the derived strings should be validated at their own merits. This is also in line and operationalizes section 3.2.3 of the policy (Limitation of delegation of variants). According to the notes and observations section 3.2.3: *For variants to be eligible for delegation, section 3.2.3 implies that all criteria apply and the required documentation and support from the Significantly Interested Parties must be available for all requested variants before validation. The proposal is attempting to strike a balance between the legitimate need for variants of an IDNccTLD to avoid user confusion and the general responsibilities for the security and stability of the root by the need to limit proliferation of strings at the root level.*

5.4.2.4.3 c. Finally, If the Selected IDNccTLD strings is valid and one or more of the requested Delegatable variant(s) of the selected string is/ are invalid, the review and/or risk mitigation process shall not be available for a review of appraisal of the invalid variant(s) (i.e. no review of the evaluation, and /or appraisal mitigation measures)

Notes and Observations
Rationale

For variants to be eligible for delegation, the policy tries to strike a balance between the legitimate need for variants of an IDNccTLD to avoid user confusion and the general responsibilities for the security and stability of the DNS by the need to limit proliferation of strings at the root level. If a requested Delegatable variant string is considered a prima facie to be confusing similar to another (delegated) string, the need to introduce such a string to avoid user confusion creates the second order side-effect of potentially adding to the confusion, which initially was supposed to be limited by the introduction of the variant. To avoid such a situation the review and/or risk mitigation process (5.5.3 and/or 5.5.4 below) should not be available to review an invalidated requested Delegatable variant IDNccTLD string or to appraise risk treatment related to such a Variant IDNccTLD string.

5.4.3 Similarity Review

5.4.3.1 Similarity Review Procedure

The SRP can be requested to conduct a second and final confusing similarity assessment of the requested IDN ccTLD string if:

1) The selected IDNccTLD string is deemed to be invalid; and
2) The request for a Similarity Review is received by ICANN within three (3) months after ICANN's notification of the results of the Similarity Evaluation.

Notes and observations

According to section above the SRP is not available for review of only the invalidated requested Delegatable variant(s) of a valid selected IDNccTLD string.

5.4.3.2 The SRP conducts its review based on the standard and methodology and criteria developed for it, and, taking into account, but not limited to, all the related documentation from the requester, including submitted additional

documentation and the finding of the Similarity Evaluation Panel. The SRP may ask questions for clarification through ICANN staff.

5.4.3.3 The results of the SRP shall be reported to ICANN staff and will be publicly announced on the ICANN website. This report shall include and document the findings of the SRP, including the rationale for the final decision, and in case of the risk of confusion a reference to the strings that are considered confusingly similar and examples where the panel observed this similarity.

If according to the Similarity Review, the SRP does not consider the string to be confusingly similar, the selected IDN ccTLD and/or its requested variant(s) is/ are valid.

If according to the Similarity Review, the SRP considers the string to be confusingly similar, the selected IDN ccTLD and/or its requested variant(s) is/ are invalid.

5.4.4 Risk Treatment Appraisal

5.4.4.1 The Objective of the Review of Risk Treatment Appraisal. The objective is to determine if the risk will be effectively mitigated i.e that If the Similarity Evaluation or Similarity Review has determined that the requested string is confusingly similar in uppercase only (and not in lowercase), the proposed mitigation measures reduce the risks associated with the confusing similarity to an acceptable level or threshold.

5.4.4.2 Base for Appraisal. The proposed mitigation measures should be evaluated in relation to the strings identified by the relevant panel (SEP or SRP) as confusingly similar to the requested string(s).

5.4.4.3 Standard of Appraisal. The RTAP Panel should consider the likelihood of confusing similarity with specific consideration of confusability from the perspective that any domain name may be displayed in either upper- or lower-case, depending on the software application and regardless of the user's familiarity with the language or script.

The proposed mitigation measures meet the objective of Risk Treatment Appraisal if:

- The requester has made clear how the risk management process and proposed mitigation measures meet the objective and criteria of the Risk Treatment. This should be evaluated together with the confusability findings.
- The residual level of risk, if any, due to the confusability of domain names is expected to be in the same range as which would occur by adding another IDN ccTLD which has not been found similar to existing or reserved TLD.

5.4.4.4 Criteria to appraise the Risk Treatment proposals. To appraise whether the proposed risk mitigation meet the objective of the RTA, the proposed risk mitigation measures should be:

- **Proportionate.** The mitigation measures will be in proportion to risks identified. The higher the risks, the greater the mitigation measures will be required; conversely, lower mitigation measures will be a proportionate response to risks that are identified as low severity or low likelihood,
- **Adequate.** For each of the case(s), the measures should reduce the risk of user confusion arising from the potential use of the applied-for TLD to an acceptable level. The residual level of risk, if any, due to the confusability of domain names is expected to be in the same range as which would occur by adding another IDN ccTLD which has not been found similar to existing or reserved TLD.
- **Self-contained.** The proposed mitigation measures can only apply to the registration policies of the applied-for TLD and do not assume any restrictions on the availability or registration policies of other current or future TLD labels.

- **Global Impact.** The proposed mitigation measures must have global applicability, and not apply to confusability within the intended user community only.

Notes and observations

The criteria to appraise Risk Mitigation proposals were develop by a joint ccNSO – SSAC working party. To test the Risk Mitigation proposals the working party conducted a case study: https://www.icann.org/en/system/files/files/eu-greek-mitigation-measures-28feb19-en.pdf . This case study, together with the related Guideline, provides the basis to interpret and implement details of the Risk Appraisal criteria and Risk appraisal procedure.

5.4.4.5 Conditions for Eligibility of the RTA. Only under the following set of conditions, a request for the RTA is eligible:

I. The SEP evaluation and - if reviewed by the SRP – the SRP review have determined that the requested string is confusingly similar in uppercase only.
II. The requester has filed a request for a review of its proposed mitigation measures within three months from the date the results from the SEP and/or SRP have been communicated to the requester.
III. In the request for the appraisal of proposed mitigation measures, the requester has included - at a minimum – a reference to the proposed, internationally recognized and appropriate risk management and mitigation process the requester intends to use, and the related, proposed mitigation measures (hereafter the Risk Mitigation Plan or RMP).
IV. The IDNccTLD Manager, and if so required the relevant public authority, commits to implement the proposed and agreed upon mitigation measures as of the moment the IDN ccTLD becomes operational.

If the above conditions are met, the review and evaluation of the proposed methodology and related mitigation measures shall be undertaken by an independent panel (the 'RTAP Panel'), appointed by ICANN.

5.4.4.6 Result of Risk Treatment Appraisal.

The result of the RTA procedure is either:

I. A documented and consolidated recommendation from the RTAP, following consultations with the requester, confirming that:
   - The requester has adopted an appropriate risk management methodology and framework;
   - The mitigation measures are proportionate and adequate to treat the risk(s) identified by the SEP or SRP (as the case may be);
   - The requester/ IDN ccTLD manager has committed to implement the mitigation measures prior to or on launch of the IDN ccTLD string(s);
   - The requested IDNccTLD string(s) is/are considered valid.

or

II. A documented recommendation confirming the risk is not adequately treated, given the list of mitigation measures being proposed by the requester or IDNccTLD Manager and the requested IDNccTLD string(s) is/are considered invalid.

The RTAP's recommendation will be made public.

5.5 Transitional arrangement - If an IDN ccTLD string request that was submitted under the Fast Track Process, still is in the Fast Track TECHNICAL and SIMILARITY Validation process, the request will be validated under the Fast Track Process, including but not limited to the Fast Track TECHNICAL and SIMILARITY review process. (See also Section 9 D).

Section 6. Publication of IDN ccTLD string

After successful completion of the request validation procedure and the IDN ccTLD string is valid according to both technical and string similarity review procedures, ICANN shall publish the selected IDN ccTLD String publicly on its website.

Section 7. Completion of IDN ccTLD selection process

Once the selected IDN ccTLD string is published on the ICANN website, and the IDN ccTLD selection process is completed, delegation of the IDN ccTLD string may be requested in accordance with the current policy and practices for the delegation, transfer, and retirement of ccTLDs. ICANN shall notify the requester accordingly.

Section 8. Change, withdrawal, or termination of the request

ICANN staff shall notify the requester of any errors that have occurred in the application. These errors include, but are not limited to:

- The selected string is already a string delegated in the DNS, or approved for delegation to another party.
- Issues pertaining to the required documentation.
- The country or territory of the request does not correspond to a listing in the ISO3166-1 list or the European Union.
- If in accordance with the independent review procedure the selected string is not valid.

If such errors emerge, ICANN staff should contact the requester, who should be provided the opportunity to:

- Amend, adjust or complete the request under the same application in order to abide to the criteria,

or

- Withdraw the request.

If the requester has not responded within 3 calendar months of receiving the notice by ICANN staff, the request will be terminated administratively.

Details of the procedures and additional elements, such as the channel of communication, will need to be further documented. This is considered a matter of Implementation planning.

Section 9. Miscellaneous

A1. Delegation of an IDN ccTLD must be in accordance with current policies, procedures, and practices for delegation of ccTLDs

Once the IDN ccTLD string has been selected and the String Validation Stage has been successfully concluded, the delegation of an IDN ccTLD shall be according to the policy and practices for delegation of ccTLDs. This means that the practices for delegation, transfer, revocation and retirement of ccTLDs apply to IDN ccTLDs.

A2. Delegation of variant(s) of the selected IDN ccTLD must be in accordance with current policies, procedures, and practices for delegation of ccTLDs

All ccTLD policies with respect to the delegation, transfer, revocation and retirement of ccTLDs are applicable to the delegation, transfer, revocation and retirement of (variant) IDNccTLDs. However, specific requirements under a policy may vary for the selected IDN ccTLD string and its variants if foreseen under this policy.

If a selected IDNccTLD string is delegated under the existing relevant policy for delegation of ccTLD, the whole set of allocatable IDNccTLD variants shall be delegated to the same entity, on the basis of the request for delegation of the selected IDNccTLD string, unless otherwise foreseen under this policy.

If a selected IDNccTLD string is requested to be transferred in accordance with RFC1591 as interpreted by the FoI to another entity, the whole set of allocatable IDNccTLD strings shall be transferred to the-same other entity, on the basis of the request for transfer of the selected IDNccTLD string, unless otherwise foreseen under this policy.

If a selected IDNccTLD string or any of its variants is revoked in accordance with RFC1591 as interpreted by the FoI, all allocated variant IDNccTLDs (delegated or withheld for future delegation) shall be revoked.

If the selected IDNccTLD string should be retired as foreseen under this policy, all variant IDNccTLD strings shall be retired, unless otherwise foreseen under this policy.

Implementation of this and other recommendations pertaining to variant IDNccTLD strings is considered a matter of implementation.

A 3 All delegated variant IDNccTLD strings must be operated by the same entity. If a specific IDNccTLD is operated by the IDNccTLD Manager all variants must be operated by the same IDNccTLD Manager (Definition: the IDNccTLD Manager is the entity or organization listed in the IANA rootzone database as the ccTLD Manager for a specific IDNccTLD).

If a selected specific a IDNccTLD is operated by a ”back-end” registry service provider under arrangement with the IDNccTLD Manager, or will be operated by a “back-end” registry service provider under arrangement with the IDNccTLD Manager, that “back-end” service provider must operate all delegated variants of that IDNccTLD.

Notes and observation

The concept “same entity” is not defined. What is considered an entity or organization varies across the various national legal systems, policies, business practices, etc. For ccTLD managers this concept is detailed in Section 10.4 (a) of the ICANN Bylaws: *“(For purposes of Article 10) a ccTLD manager is the organization or entity responsible for managing a ccTLDaccording to and under the current heading "Delegation Record" in the Root Zone Database, or under any later modification, for that country-code top-level domain”*

B. Confidentiality of information during due diligence stage (read: validation Stage), unless otherwise foreseen.

It is recommended that the information and support documentation for the selection of an IDN ccTLD string is kept confidential by ICANN until it has been established that the selected string meets all criteria.

Notes and observations

As noted above, the ISO 3166-1 is not only relevant for the creation of a ccTLD. Once an entry is removed from the list of country names, the ccTLD entry in the root zone database may need to be adjusted/removed to maintain parity between the ISO 3166 list and the root-zone file[28].

C. REVIEW MECHANISM for decisions under the proposed policy

Some proposals under this proposed policy may result in ICANN org decisions to de-select an IDNccTLD string and/or its variants, and hence to retire an IDNccTLD or its variants. According to the ccTLD retirement policy (as adopted in September 2022), the retirement of an (IDN)ccTLD requires the IFO to serve a Notice of Retirement to the (IDN)ccTLD Manager. This Notice formally starts the (clock of the) ccTLD retirement process.

Similar as under the proposed ccPDP3 Review Mechanism policy – if a ccTLD Manager is directly impacted by a Notice of Retirement for two-letter Latin ccTLD which does not correspond to an ISO 3166-1 Alpha-2 Code Element - it is proposed that the review mechanism should be available to an IDNccTLD Manager who is served a Notice of Retirement following the de-selection of an IDNccTLD string and/or its variants strings resulting from:

[28] See: http://www.iana.org/reports/2007/rs-yu-report-11sep2007.html

- (Section 1.3. De-selection.) Change of Name of the Territory, Change of designated language, Change of script or writing system
- (Section 2.3.) Impact IDNccTLD string becomes contentious within the Territory
- (Section 3.2.4.)Demonstrable threat of DNS security and stability of the DNS as the result of the impact of an amendment of the RZ-LGR.

Notes and Observations

Note 1. The case that the de-selection of an IDNccTLD and its variants is the result of the removal of the name of the **Territory** from the ISO3166 is excluded from the review process. The decision to remove the name of a territory from the ISO3166-1 is an external decision (ISO3166-MA).

Rationale: The circumstance leading up to the removal of a line item should not be subject to a review. This reflects the basic understanding that *IANA (read ICANN) is not in the business of determining what is and what is not a country (read Territory)* and further the understanding that ISO has a process to do so.

Note 2. Note that due to its nature the Confusing Similarity Validation Process includes specific procedure to allow for the review of the outcome of the first evaluation and – related and under specific circumstances – review measures to mitigate risks associated with the visual confusability of a selected IDNccTLD string.

Rationale: Firstly, the IFO is not involved in any decisions pertaining to confusing similarity or whether a IDNccTLD string meets the technical criteria. Secondly, by its very nature confusing similarity review is subjective. Therefore, a second, alternative approach is needed to limit the level of subjectivity. Finally, the purpose of confusing similarity validation is to reduce security risks associated with the introduction of a IDNccTLD. Under specific circumstances alternative measures reduce the risk associated with confusion to an acceptable level.

D. Transitional arrangement regarding IDN ccTLD strings under the Fast Track IDN ccTLD Process

1. Closure of Fast Track Process. As of the moment ccPDP4 has been fully implemented and is available for processing requested selected IDNccTLD strings, the Fast Track Process must be closed for new selected IDNccTLD string requests.
2. If at the time the IDNccTLD request process based on ccPDP4 becomes available, IDN ccTLD string requests which are still in the Fast Track Process must be completed through the Fast Track Process. Completion results either in publication of the selected IDNccTLD string in accordance with section 5.6.4 of the FIP, or results in the withdrawal of the request by the requestor or in termination of the request by ICANN in accordance with section 5.4 of the Final Implementation Plan[29].
3. All IDNccTLD strings that have been validated under the Fast Track Process, will be deemed to be validated under the IDNccTLD policy for the selection of IDNccTLD strings, and are grandfathered. The recommendations under this policy development process with respect to the de-selection of IDNccTLD strings shall be applicable to the grandfathered IDNccTLD strings.

[29] https://www.icann.org/en/system/files/files/idn-cctld-implementation-plan-28mar19-en.pdf . From the FIP: "*Several of the steps in the Request Submission for String Evaluation (Stage 2) allow for a requester to withdraw a request. It is also possible that ICANN will terminate a request if the request contains certain errors. "* In addition several circumstances are listed in the FIP, which trigger a termination by ICANN, for example, according to Section 5.6.3 "*If the requester has not notified ICANN within three (3) calendar months after the date of notification by ICANN of DNS Stability Panel findings, the Termination Process will be initiated. See section 5.4* "

E. Review of policy for the selection of IDN ccTLD strings

It is recommended that the policy will be reviewed within five years after implementation or at such an earlier time warranted by extraordinary circumstances. It is also recommended that the ccNSO Council initiates such a review by launching a review group who will be tasked to review the ascertain whether the policy needs to be updated and advise the ccNSO Council on the proposed method for such an update. The scope and working method of such a review must be determined by the ccNSO after consulting relevant stakeholders, and take into account the experience with the ccPDP4 process and relevant circumstances and developments with respect to IDN TLDs

In the event such a review results in a recommendation to amend the policy, the rules relating to the country code Policy Development Process as defined in the ICANN Bylaws should apply.

Review of the existing IDNccTLD string selection process (Fast Track Process)

With respect to the update of the Fast Track Process Implementation Plan, the ccNSO has requested a standstill of the evolution of the Fast-Track process. See letter ccNSO to the ICANN Board of Directors https://ccnso.icann.org/sites/default/files/field-attached/sataki-to-chalaby-04sep19-en.pdf and response from the chair of the Board: https://www.icann.org/en/system/files/correspondence/chalaby-to-sataki-31oct19-en.pdf

The ccPDP4 WG agrees with this approach and the evolution of the Fast-Track Process, if at all, should be limited to address issues that cause a demonstrable threat to the security and stability of the DNS, can only be addressed though an amendment of the Fast-Track Process, and require resolution before completion and implementation of the envisioned ccPDP 4.

F. Verification of Implementation

It is anticipated that some parts of the recommendations and process steps will need to be further refined and interpreted by ICANN staff before they will be implemented. It is further anticipated that this will be done through an implementation plan or similar planning document. It is therefore recommended that the ccNSO monitors and evaluates the planned implementation of recommendations and the ccNSO Council reviews and approves the final planning document before implementation by staff.

G. Non-applicability IRP/RECONSIDERATION

In July 2022 the ccNSO Council requested that the ccPDP4 WG look at the need for further clarification of the ICANN Bylaws Sections 4.2 (d) (i) and 4.3 (c) (ii), and, if clarification is needed, make a recommendation to that effect.

The ccPDP 4 WG makes the following recommendations regarding ICANN Bylaws Sections 4.2 (d) (i) and 4.3 (c) (ii):

- As IDNccTLDs are ccTLDs, all disputes and claims related to the delegation, transfer, and revocation of IDN ccTLDs, shall remain excluded from ICANN's Reconsideration Process and the Independent Review Process for Covered Actions.
- As IDNccTLDs are ccTLDs, all disputes and claims related to the retirement of an IDNccTLD shall be excluded from ICANN's Reconsideration Process and the Independent Review Process for Covered Actions.
- The ccPDP 4 WG recommends that the relevant section of the ICANN Bylaws shall be amended accordingly, including but not limited to amending the terms " delegation and re-delegation" to "delegation, transfer, revocation and retirement ", and if considered advisable for avoidance of doubt, replace "ccTLDs" with "ccTLDs and IDNccTLDs" Amendment of the Bylaws is considered a matter of implementation.

- The ccNSO is advised to consider that any future policy to be developed by the ccNSO and which can affect the stewardship of a ccTLD, including an IDNccTLD, should include a consideration whether claims and disputes flowing from the application of the policy should be excluded from ICANN's Reconsideration Process and the Independent Review Process for Covered Actions, and if so, explicitly specify the outcome of this consideration in any such policy.

Annex A: Specific terminology used in policy proposal

Term	Definition/Description	Document, section	Comment
Territory, Territories	"Territory" or "Territories" are defined as a country, a subdivision, or other area of particular geopolitical interest listed in Section 3 of the 'International Standard ISO 3166, Codes for the representation of names of countries and their subdivisions – Part 1: Country Codes' [ISO 3166-1:2020] or, in some exceptional cases, e.g. grandfathered-in delegations, a country, a sub-division, or other area of particular geopolitical interest listed for an exceptionally reserved ISO 3166-1 code element	ccPDP4-WG Work Document Section 2.1.1 Version 05 – 06 January 2021, I	The definition of territory may be included in Article 10 of the ICANN Bylaws for purposes of Article 10.

Term	Definition/Description	Document, section	Comment
Meaningful Representation	A country code string is considered to be a **Meaningful Representation** if it is: a. The name of the **Territory**; or b. Part of the name of the **Territory** that denotes the **Territory**; or c. A short-form designation for the name of the **Territory**, recognizably denoting the name.	Policy proposals for IDN ccTLD String Selection Criteria, Requirements and Processes v05, section 3.2	
Designated Language	A language that has a legal status in the or that serves as a language of administration	Policy proposals for IDN ccTLD String Selection Criteria,	

Term	Definition/Description	Document, section	Comment
		Requirements and Processes v05, section 3.2	
Withheld-same-entity Variant	A Withheld label or string is set aside for possible allocation only to the same entity of the other labels in the variant set.		
Blocked Variant	A status of some label (string) with respect to a zone, according to which the label is unavailable for allocation to anyone. The term “to block” denotes the registry (the zone operator) taking this action.		Source document: IDN Variant TLD Implementation: Appendices Page 5
Allocatable or Allocated Variant	A status of some label (string) with respect to a zone, whereby the label is associated administratively to some		IDN Variant TLD Implementation: Appendices Page 5

Term	Definition/Description	Document, section	Comment
	entity that has requested the label. This term (and its cognates “allocation” and “to allocate”) represents the first step on the way to delegation in the DNS. When the registry (zone operator) allocates the label, it is effectively making a label a candidate for activation. Allocation does not, however, affect the DNS at all.		
Activated/Active	A status of some label with respect to a zone, indicating that there are DNS resource records at that node name; or else that there are subordinate names to that name, even though there are no resource records at that node name. In the case		

Term	Definition/Description	Document, section	Comment
	where there are resource records at the node name, any resource record will do. In the case where there are subordinate names but no resource records (except those to support DNSSEC), the label names an empty non-terminal. A registry (zone operator) setting the active status activates the name, or performs activation.		
Delegation	Process to assign a ccTLD to a manager		https://www.iana.org/help/cctld-delegation
Delegatable IDNccTLD	IDNccTLD string eligible to be assigned to a ccTLD Manager		
Delegated (technical definition)	A status of some label with respect to a zone, indicating that in that zone		IDN Variant TLD Implementation: Appendices **Page 5**

Term	Definition/Description	Document, section	Comment
	there are NS resource records at the label. The NS resource records create a zone cut, and require an SOA record for the same owner name and corresponding NS resource records in the subordinate zone. The act of entering the NS records in the zone at the parent side of the zone cut is delegation, and to do that is to delegate. This definition is largely based on RFC 1034; the reader should consult RFC 1034 for detailed discussion of how the DNS is broken into zones.		
Withheld-same-entity	A Withheld label is set aside for possible allocation to only the		IDN Variant TLD Implementation: Appendices Page 5

Term	Definition/Description	Document, section	Comment
	same entity of the labels in the variant set		
Selected String or Selected IDNccTLD	The IDNccTLD that was selected in Territory and supported by the Significantly Intersted Parties in the Territory to which the IDNcountry code relates.		
Rejected or non-Valid string	A Rejected string is set aside on administrative grounds outside the ordinary LGR procedures. Other terms used “Not Approved” and “Will Not Proceed”. Strings that cannot be allocated on visual confusability grounds, based on the string similarity review step in the TLD application process, are also Rejected.		
IDNccTLD Manager	IDNccTLD Manager is the entity or organisation		ccTLD Manager definition derived from general

Term	Definition/Description	Document, section	Comment
	listed in the IANA rootzone database as the ccTLD Manager for a specific IDNccTLD		definition ICANN Bylaws section 10.4 (a)

Annex B. Terminology derived from the ISO 3166 Standard

Included is basic terminology included in the ISO3166 Standard, which was identified by the ccPDP3 Retirement WG in the context of developing the process for the retirement of ccTLDs. Some of these terms are also used in the context of ccPDP4.

Notes with respect to the terminology derived from the ISO 3166 Standard:

- In this overview a distinction is made between terminology defined in the 2013 and 2020 editions of the Standard and the ISO Online Browsing Platform (OBP). The terminology defined in the Standard is included in the table in normal font. The terminology used in the Online Browsing Platform is *emphasized*.
- The definitions contained in the Standard are considered to take precedent. Terminology from the Online Browsing Platform is only included for informational purposes. It is strongly advised not to use or refer to the informational terms in Policy and policy related documents.
- A new version of ISO 3166 was published very recently (2020). The major change is that the table of country codes is no longer part of the printed standard but online as part of the ISO Open browser Platform (iso.org/obp). The text of the standard reflects this change with some additional definitions. Also, there are non-substantial changes to other definitions to abide to the new ISO guidelines for writing and publishing standards.

Term/Practice	Definition/Description	Defined in:	ISO 3166: 2020 terminology
Assigned (or allocated) code elements	The result of applying the principle of visual association between the country names	ISO Standard Section 5.1	Section 5.2: The principle behind the alphabetic codes in the code corresponding to this document is a

Term/Practice	Definition/Description	Defined in:	ISO 3166: 2020 terminology
	(in English or French, or sometimes in another language) and their corresponding code elements.		visual association between the country names (in English or French, or sometimes in another language) and their corresponding code elements. In applying this principle, the code elements have generally been assigned on the basis of the short names of the countries, thus avoiding, wherever possible, any reflection of their political status. The distinguishing signs for road vehicles reported by the contracting parties to the Conventions on Road Traffic (1949 and 1968; see Reference [21]) provided the major source for code elements for the code corresponding to this document.
Unassigned	NOT DEFINED IN THE STANDARD		Mentioned in 3.10. status of alpha-2 country code element (in the OPB) information whether the code element is assigned, unassigned or reserved transitionally, exceptionally, or for an indeterminate period

Term/Practice	Definition/Description	Defined in:	ISO 3166: 2020 terminology
Unassigned	*Code Elements that have not been assigned to country names.*	ISO Online Browsing Platform	
Deletions from the list of country names	Deletions from the list of country names shall be made on the basis of information from the United Nations Headquarters, or upon the request of a member of ISO 3166/MA. The ISO 3166/MA shall decide upon deletion, on the basis of the information given. ISO3166-3 provides the list of country names deleted in this part of ISO 3166 since its first edition in 1974.	ISO Standard Section 7.3	Deletions from the list of country names shall be made on the basis of information from the United Nations Headquarters, or upon the request of a member of ISO 3166/MA. The ISO 3166/MA shall decide upon deletion, on the basis of the information given. ISO3166-3 provides the list of country names deleted in this part of ISO 3166 since its first edition in 1974.
Reservation of Code Elements	Some code elements are reserved. For a limited period when their reservation is the result of the deletion or alteration of a country name. For an indeterminate period when the reservation is the result of the application of	ISO Standard Section 7.5 & 7.5.1	Now in Section 7.6 & 7.6.1

Term/Practice	Definition/Description	Defined in:	ISO 3166: 2020 terminology
	international law or of exceptional requests.		
Reallocation Period	Some code elements are reser For a limited period when thei is the result of the deletion or a country name. For an indeterminate period w reservation is the result of the international law or of exceptional requests.	ISO Standard Section 7.5.2	*Section 7.6.2 New text* Country code elements that the ISO 3166/MA has altered or deleted should not be reassigned during a period of at least fifty years after the change. The exact period is determined in each case on the basis of the extent to which the former code element was used.
Transitionally Reserved	NOT DEFINED IN THE STANDARD		mentioned in 3.10. status of alpha-2 country code element (in the OPB)
	Codes that are reserved during a transitional period while new code elements that may replace them are taken into use. This results from changes in the standard.	ISO 3166 Online Browsing Platform Glossary.	

Term/Practice	Definition/Description	Defined in:	ISO 3166: 2020 terminology
Period of Non-Use	Certain code elements existing at the time of the first publication of the ISO 3166 country codes and differing from those in this part (ISO 3166-1) should not be used for an indeterminate period to represent other country names. These code elements should be included in the list of reserved code elements and should not be reallocated during a period of at least fifty years after the date the countries or organizations concerned have discontinued their use.	ISO Standard 7.5.3	Now section 7.6.2 Certain country code elements existing at the time of the first publication of the ISO 3166 country codes and differing from those in this part of ISO 3166 should not be used for an indeterminate period to represent other country names. This provision applies to certain vehicle designations notified under the 1949 and 1968 Conventions on Road Traffic. Code elements to which this provision applies should be included in the list of reserved code elements (see 7.6.5) and should not be reassigned during a period of at least fifty years after the date when the countries or organizations concerned have discontinued their use.

Term/Practice	Definition/Description	Defined in:	ISO 3166: 2020 terminology
Exceptionally Reserved	Code elements may be reserved, in exceptional cases, for country names which the ISO 3166/MA has decided not to include in this part of ISO3166, but for which an interchange requirement exists. Before such code elements are reserved, advice from the relevant authority must be sought.	ISO Standard 7.5.3	Now Section 7.6.4
Exceptionally Reserved	*Codes that have been reserved for a particular use at special request of a national ISO member body, governments or international organizations.*	ISO 3166 Online Browsing Platform Glossary.	Section 7.6.4 Code elements may be reserved, in exceptional cases, for country names which the ISO 3166/MA has decided not to include in the code corresponding to this document, but for which an interchange requirement exists. Before such code elements are reserved, advice from the relevant authority should be sought.

Term/Practice	Definition/Description	Defined in:	ISO 3166: 2020 terminology
Reallocation	Before reallocating a former code element or a formerly reserved code element, the ISO3166/MA shall consult, as appropriate, the authority or agency on whose behalf the code element was reserved, and consideration shall be given to difficulties which might arise for the reallocation.	ISO Standard Section 7.5.5	Section 7.6.2. See the period of non-use entry
Indeterminately Reserved	NOT DEFINED IN THE STANDARD		mentioned in 3.10. status of alpha-2 country code element (in the OPB)
Indeterminately Reserved		ISO 3166 Online Browsing Platform glossary.	
Country Name	Name of country, dependency, or other area of particular interest	ISO Standard Part 1 Section 3.4	Section 3.4 (OBP 3.14-3.18, 3.22)
Country Code	Listing of country names with their representations by code elements	ISO 3166 Part 1 Section 3.3	Section 3.3 (OBP 3.10-3.13)

Term/Practice	Definition/Description	Defined in:	ISO 3166: 2020 terminology
Code Element	The result of applying a code to an element of a coded set	ISO 3166 Part 1 Section 3.2	Section 3.2 (OBP 3.10-3.13)
Code	Set of data	ISO 3166 Part 1 Section 3.1	Section 3.1, changed definition: set of data transformed or represented in different forms according to a pre-established set of rules
List of Country Names	Part of the Clause 9 list	ISO 3166 Part 1 Section 6, 6.1. In clause 6 of part 1 the content of the list is enumerated in Clause 9.	The whole clause disappeared. The list is replaced with the ISO Open Browser Platform portal. and that is therefore there are definitions 3.xx in the standard
Formerly Used Codes	NOT DEFINED IN THE STANDARD		Defined in Part 3, Section 3.3.3 **alpha-4 formerly used country code element** coded representation of country no longer in use

Term/Practice	Definition/Description	Defined in:	ISO 3166: 2020 terminology
Formerly Used Codes	*Codes that used to be part of the standard but that are no longer in use. See alpha-4 codes.*	ISO 3166 Online Browsing Platform	

Annex C: Advise to IDNccTLD Managers with respect to IDN Tables and registrations under the IDNccTLD (variants)

C.1 Advise to IDNccTLD Managers with respect to IDNTables

A. Submission of IDN Table

Observations.

The variant management sub group agreed that it should be determined whether an issue is relevant and if so, whether it should be addressed through a policy proposal or - if considered out of the policy scope - should be considered advise to ccTLD managers, with a link to background material regarding the topic. To do so, the group will first decide whether a topic/issue should be addressed and if so, it is considered as policy matter or the WG should /could and advise and include a reference to the background material. Implementation of the advice is not mandatory, but expected. The goal is to ensure that ccTLD Managers and others involved in IDNs are aware of issues, risks and potential solutions to address the issues or mitigate the risks.

The WG notes that according to the current Guideline for the Implementation of Internationalized Domain Names[30] (hereafter: IDN Guideline), "*Top-level domain ("TLD") registries supporting Internationalized Domain Names ("IDNs") will do so in strict compliance with the requirements of the IETF protocol for Internationalized Domain Names in Applications*." (Currently, May 2022, IDNA 2008).

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[30] At the time of writing this document Version 4.1 was adopted by the ICANN Board of Directors in September 2022. See: https://www.icann.org/resources/board-material/resolutions-2022-09-22-en#2.d . According to the introduction of version 4.1: "For other registries (e.g. Country Code TLD registries) this document is intended as the best current practice."

According to RFC 7940[31] LGRs are "*algorithms used to determine whether, and under what conditions, a given identifier label is permitted, based on the code points it contains and their context. These algorithms comprise a list of permissible code points, variant code point mappings, and a set of rules that act on the code points and mappings. LGRs form part of an administrator's policies. In deploying Internationalized Domain Names (IDNs), they have also been known as "IDN tables" or "variant tables"."*

The variant management subgroup notes that the term "IDN Table" may give rise to misunderstandings. The procedures or policies which are currently referred to as "Label Generation Rulesets[32]" (LGRs), were historically refered to as "IDN tables" or "variant tables." Currently (May 2022) and under this policy, the term "IDN Table" or "IDN Tables" is used in the context of second and lower level registration policies. For Top Level Domains the term "Root Zone -Label Generation Ruleset" or "RZ-LGR" is used.

The subgroup WG further notes that the scope for ccNSO developed policies is limited and excludes ccTLD registration policies. The WG also notes the statement in draft[33] IDN Guideline version 4.0 that the IDN Guideline version 4.0 is intended as the best current practice for Country Code TLD registries.

Finally the WG notes in this context that under the proposed policy for selection of IDNccTLDs under the Overall Principle to *Preserve security, stability and interoperability of the DNS, it is stated that to the extent different and/or additional rules are implemented for IDN ccTLDs, these rules should:*

[31] see: https://www.rfceditor.org/rfc/pdfrfc/rfc7940.txt.pdf

[33] In June 2022, IDN Guideline version 4.0 is a draft, pending adoption by the ICANN Board of directors.

a. ……

b. Ensure adherence with the RFC 5890, RFC 5891, RFC 5892, RFC 5893

c. …….”

Advise.

To enhance adherence with the relevant RFCs and to inform TLD Operators, including but not limited to other IDNccTLD Managers and stakeholders, in a transparent and accountable manner, the WG strongly suggests that IDNccTLD Managers are expected (but not required) to publish *repertoires of Unicode code points that are permitted for registration under the selected IDNccTLD string and/or its variants* (hereafter: IDN Table) and be guided by the Guidelines for the Implementation of Internationalized Domain Names applicable at the time. The IDN Table or Tables are expected to be published and included in IANA IDN Practices Repository in accordance with the relevant and applicable procedures at the time the selected IDNccTLD and/or it variant(s) is requested.

Further, it is expected that the registration of any domain name containing an unlisted code point will not be accepted.

If the same script/language combination is used in two or more Territories, cooperation between relevant parties in the relevant Territories is encouraged to define an IDN Table for that script/language combination. ICANN is advised either to facilitate these processes directly or indirectly.

The WG notes that according the current (June 2022) IANA IDN Repository procedure, the purpose of the repository is to publish IDN Tables that have been verified as coming from representatives of domain registries. Therefore, the ultimate responsibility for the content of the IDN Table for an IDNccTLD is with the IDNccTLD Manager. However, to ensure consistency across IDN Tables for the same script and/or language/script combinations and hence ensure security and

stability of the DNS, IDNccTLD Managers are encouraged that prior to submission ICANN is requested to review the design of the proposed IDN Table on adherence with the relevant and applicable IDN Guidelines version. The results of the review will be shared with the relevant IDNccTLD Manager(s) to allow adjustment of the design if deemed appropriate by the IDNccTLD Manager(s).

C .2 Advise with respect to registrations under the IDNccTLD (variants) under management

Observations.

The variant management sub-group agreed that it should be determined whether an issue is relevant and if so, whether it should be addressed through a policy proposal or - if considered out of the policy scope - should be considered advise to ccTLD managers, with a link to background material regarding the topic. To do so, the group will first decide whether a topic/issue should be addressed and if so, it is considered as policy matter or the WG should /could and advise and include a reference to the background material. Implementation of the advice is not mandatory, but expected. The goal is to ensure that ccTLD Managers and others involved in IDNs are aware of issues, risks and potential solutions to address the issues or mitigate the risks.

The subgroup further noted that the scope for ccNSO developed policies is limited and excludes developing and recommending ccTLD registration policies (ANNEX C ICANN Bylaws).

The WG notes in this context that under the proposed policy for selection of IDNccTLDs under the **Overall Principle III (**Section 0, page above)

"Preserve security, stability and interoperability of the DNS. To the extent different and/or additional rules are implemented for IDN ccTLDs, these rules should:

(a) Preserve and ensure the security and stability of the DNS;

(b) ….

(c) ….

The basic policy premise of introducing variants is that a selected (IDNccTLD) string/label and its variants are one and the same. However, note that from a technical perspective a selected string/label and its variants are separate entries in the DNS[34].

In various reports and studies[35] the following two issues have been identified, which both are driving the need to mitigate the risks associated with these issues:

- No Connection (Denial of Service)
- Misconnection

[34] According to SAC060 (https://www.icann.org/en/system/files/files/sac-060-en.pdf) and reiterated in SAC120 (https://www.icann.org/en/system/files/files/sac-120-en.pdf): *"An IDN variant is an alternate code point (or sequence of code points) that could be substituted for a code point (or sequence of code points) in a candidate label to create a variant label that is considered the "same" in some measure by a given community of Internet users. There is no general agreement of what that sameness requires."* Further, according to SAC120: "*From a technical perspective, two strings that are delegated in the DNS are two different delegations just like any two other domain names. Variants are no exception."*

[35] See: SAC060, https://www.icann.org/en/system/files/files/sac-060-en.pdf
IDN Variant TLD Implementation: Risks and Mitigation, https://www.icann.org/en/system/files/files/idn-variant-tld-risks-mitigation-25jan19-en.pdf

According to SSAC the second issue – Misconnection – *"causes worse results compared to denial of service because misconnection "presents issues of possible credential leakage, accidental disclosure of information, and user confusion and frustration". F*urther *"Confusability cannot be considered in isolation from other issues related to security. Phishing and other social engineering attacks based on domain name confusion are a security problem for end users"*

To maintain this basic policy premise and minimize the risk of user confusion and – related- security issues arising from diverging registrations i.e arising from delegation of domain names that are deemed to be same to two different entities to be the same, the following risk mitigation measures are proposed:

Advise to ccTLDs

A Second Level string registered under a delegated variant IDNccTLD string <u>is expected</u> to be registered for the same entity under all other delegated variant IDNccTLD strings. If (multiple) IDNccTLD variant strings have been delegated, then a second-level domain name that is registered under one (of the variant) IDNccTLD string **is expected** to be registered for one and the same entity or withheld for possible future registration for that entity under all delegated IDNccTLD variant strings.

If a variant IDNccTLD string is delegated after the IDNccTLD has become operational this advice also applies: under the newly delegated variant IDNccTLD string an already registered second level domain name under another variant IDNccTLD variant string is expected be registered or withheld for future registration for the same entity.

All variants of a Second-Level string registered under all delegated variant IDNccTLD strings <u>are expected</u> to be registered for the same entity under all IDNccTLD variant strings. Assuming multiple Delegatable variant IDNccTLDs

strings have been delegated, and that for assuming a second level IDN domain name, which is in process of being registered under an IDNccTLD string a set of allocatable variant second level strings can generated by applying the IDN Table, THEN the set of allocatable variant second level strings **are expected** to be either registered under all delegated IDNccTLD variant strings for one and the same entity or withheld for possible future registration under all delegated IDNccTLD variant strings for one and the same entity

All variants of a Second-Level domain name to be registered under a delegated IDNccTLD string <u>are expected</u> to be registered to the same entity. If for a second level string to be registered under a delegated IDNccTLD string a set of allocatable variant second level strings can generated by applying the IDN Table for second level strings under the IDNccTLD string, THEN the set of allocatable variant second level strings **are expected** to be either registered for one and the same entity or withheld for possible future registration for that entity

In addition ICANN is strongly advised to introduce a mechanism as currently (September 2022) in use under the Fast Track that as part of the IDNccTLD request procedures a requestor of the IDNccTLD commits to and/or ensures that the IDNccTLD managers commits to the advice.
The details of this commitment are considered a matter of implementation.

(New) Note and observation
The concept “same entity” is not defined. What is considered an entity or organization varies across the various national legal systems, policies, business practices, etc. For ccTLD managers this concept is detailed in Section 10.4 (a) of the ICANN Bylaws: *“(For purposes of Article 10) a ccTLD manager is the organization or entity responsible for managing a ccTLDaccording to and under the current heading "Delegation Record" in the Root Zone Database, or under any later modification, for that country-code top-level domain”*

Annex D: Comparison proposal ccNSO ccPDP4 and GNSO IDN EPDP

Annex E:

Stress testing

Version 8, 2 June 2023 Final

Further, the stress test have ben numbered through (for ease of reference).
Column: Discussed has been updated.

Eligibility of Application

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy?	Adjusted secton in text
1.	What if the applicant/ intended IDNccTLD Manager is not member of the ccNSO, does proposed policy apply? Does IDN ccPDP policy and the delegation /transfer /revocation policy apply?	Scope of policy to be included in introduction section	Any Policy developed by the ccNSO is by definition only targeted at ICANN (see Annex C of the ICANN Bylaws). Whether an applicant / requester of the IDNccTLD is member of the ccNSO is immaterial. The applicant / requester has to meet all conditions set by the policy.	To be included in introduction of Initial report scope of policy and reference to Issue Report	Accepted second reading (12 March 2023

(De)-selection Criteria/ retirement related scenario's

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Discussed Y/N?
2.	Country name is replaced by other country name (in designated language). What if the English/French name of the country doesn't change, but the name of the country changes in the national language?	Section 1.2.1 and section 1.3.1	If the change of the name of the Territory changes in the Designated Language this is considered a change in a basic requirement for IDNccTLD. The proposed policy deals with this situation in section 1.3.1, including when such a change is considered to be a "Trigger Event".	N	Accepted second reading 4 April
3.	What if an IDN ccTLD no longer qualifies as an IDN ccTLD? Is retirement needed?	Section 1.3, section 2 and Section	As a general statement it cannot be answered, but depends on circumstances. However as general principal, if after a change in circumstances the IDNccTLD no longer qualifies as such, such a change could result in a "Trigger Event". The ccPDP4 was tasked to define "Trigger Events" that could initiate the retirement process.	No	Accepted second reading 4 April
4.	What if IDN ccTLD manager refuses to go through retirement process?	Retirement policy section 4.3, stress test iii Retirement policy, Section 4 FoI	The Retirement Process is considered out of scope of the IDNccPDP policy effort. The stress tests of the retirement policy address the test.	No	Concluded reading 12 March

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Discussed Y/N?
5.	What if IDNccTLD Manager is no (longer) member of the ccNSO, do de-selection and retirement policy apply?	Stress testing Retirement policy, Annex C ICANN Bylaws	The Retirement Process is considered out of scope of the IDNccPDP policy effort. The stress tests of the retirement policy address the test.	No	Concluded reading 12 March
6.	What if the IDN ccTLD that is going to be retired is widely used by another community (e.g. tech community (not necessarily local community))?	Retirement Policy section 4.3 and 4.4, Retirement stress test # ii and xii.	The Retirement Process is considered out of scope of the IDNccPDP policy effort. The stress tests of the retirement policy addresses the test.	No	Concluded reading 12 March
7.	What if the Country name as listed on standard is changed (ENG/FR)	Section 1.2.2	If a Designated Language of the Territory is not French or English, and if only the English and/or French version of the name of the Territory is changed, then such a change does not have any impact.	No	Concluded reading 12 March
7. a	Assuming the removal of an IDNccTLD string is the result of the change of the name of the territory in the Designated Language. Under ISO3166-1 there is a standard cool down - period (or a removal of the territory from the ISO3166- 1 standard. Accordingly (section 7.6.2) *Country code elements that the ISO 3166/MA has altered or deleted should not be reassigned during a period of at least fifty years after the change. The exact period is determined in each case on the basis of the extent to which the former code element was used.*	Principle I and Section 1.3	Support for introduction of "cooling down" period to avoid confusion. Proposed start of "cooling down" period is the moment removal of the relevant IDNccTLD(s) from the root-zone file. Note that that the act of removal is the conclusion of the retirement process, but not part of it.	Yes: to be included in new section (most likely in Miscellaneous (section 9) or Applicability of policies	Second reading 18 April 2023

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Discussed Y/N?
	Is this period relevant for the re-use of the country name as an INDccTLD? Or its variants?		What is considered a reasonable period will be determined in new ccPDP. In first reading the suggestions varied from 10-30 years (not considering the duration of the retirement procedure). In second reading the agreed upon minimum period is 10 years. Although a request for re-use may be very unlikely (taking into account that the selected string has to be a meaningful representation of the name of the Territory) a cooling down is believed to be warranted to avoid overlap with cached entries with a very high TTL's, other potential issues, and other uses.		
7.b	Assume an IDNccTLD is removed from the root-zone file. Who determines the IDNccTLD can be re-used again? ICANN, ccNSO, external organization?	Not addressed Basic Principle RFC 1591: IANA (read ICANN) is not in the	In first reading various mechanisms were initially discussed: - Appoint external panel to determine re-use - Leave it to ICANN	Yes	Second reading 18 April

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Discussed Y/N?
	For Country Code elements to be assigned by the ISO 3166/MA, a code will be re-assigned by the ISO 3166/MA.	business to determine what is and what is not a country.	- Start a ccNSO PDP after retirement of one or more IDN ccTLDs has been completed (ccNSO is policy making body) Discussion ended in agreement that ccNSO should launch a ccPDP after removal of the IDNccTLD string(s) from the Root Zone flle, taking into account the 10 year suggested "cooling down" period of 10 years. Factors to consider in ccPDP to determine in the "cooling down" period before possible re-use are: - Use of the IDNccTLD before retiement - Cause of retirement - Possible re-use of the IDNccTLD string - Mechanism to allow re-use		
8.	What if a selected IDN ccTLD string and all its variants are retired and someone else applies for the retired label. What happens?	Principle IV, Section 1.2	If all criteria are met, including but not limited to the requirements that the new to be requested selected IDNccTLD string is a meaningful representation of the name of	No	Second reading 18 April 2023

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Discussed Y/N?
			Territory etc., then nothing withstands such a new request. However, the cooling down period and the newly to be developed policy will determine when and how the retired string(s) can be applied for (again)		
9.	What if a ccTLD Manager wishes to retire the selected IDNccTLD strings (due to natural reasons, such as removal of support of the script on the governmental level), and the ccTLD IDN to be retired is the selected (primary) IDNccTLD?	Section 1.3, see also other more specific tests for example # 1, 6, 10 and 11	If the selected string is to be retired, all delegated variants should follow. By definition variants are derived from and are considered related to the selected IDN ccTLD sting. Hence, the variants follow the fate of the defining IDNccTLD string.	Include a general statement, that if a selected cctld string is retired, all degetable variants which have been delegated, follow the fate of the selected IDNccTLD string. There should be no confusion as to whether the delegatable variants can remain in the root zone. In addition all non-delegated delegatable variants shall be non-eligible as IDNccTLD for this Territory .	Second reading, 04 April 2023, was supported.

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Discussed Y/N?
~~9.~~	~~What if two countries are merged, like Eastern and Western Germany,~~ ~~i. what if they used the same IDNs Scripts?~~ ~~ii. What if they would use different scripts~~ ~~iii. What if Eastern Germany had an IDN ccTLD that was retired?~~	~~Principle I~~	~~This test is subsumed in test 16.~~		No longer a scenario subsumed in #16
10.	What if the script of the local language changes and the country has decided to change the script it uses?	Section 1.3.2 & section 1.3.3	This situation is covered in section 1.3.2 and 1.3.3. In principle a change of the Designated Language and change of the script in which the Designated Language is expressed could initiate the procedure ending in a "Trigger Event".	N	Adopted second reading 2 May 2023
11.	What if a territory script and language match, but a significantly interested party withdraws from the existing script and would like to propose a new script. Would the Deselection process be triggered?	Section 1.2.2, 1.2.3 Section 1.2.7 and section 2.2 & 2.3	Whether a significant interested party supports or does not support the script is irrelevant. The SIP is only expected to support the selected string. Note that the for the term Designated Language in other contexts the term "Official Language" is used. To be considered "Designated" under the policy the Language should meet one of the criteria listed in section 1.2.2.	N	Adopted second reading 2 May 2023

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Discussed Y/N?
12.	What if a country name is changed and the script and language remains the same, however the relevant people would like to retain the same name as they had before the same?	Section 1.3 & Section 2.1, 2.2 and 2.3	If the country name is changed, and after this change the initial selected IND ccTLD is no longer a meaningful representation of the name of the country in the designated language, the selected string no longer meets the criteria. In principle this could end up in a "trigger event", However according to section 1.3.1, ICANN is not expected to monitor actively, but as soon as changes are needed the procedure leading to the "Trigger Event" will start.	N	Adopted second reading 2 May 2023
13.	Country split from AA to AA and A'A' . The ISO3166-1 two (2) letter code AA remains for one country. The split results in assigning different ISO3166-1 code A'A' to other part. Before the split (A'A')IDN ccTLDs was related to AA and will be kept, including the variant(s), subject to local decision only. This will 'block' the names for the split off Territory A'A'. Is there a way for A'A' to trigger deselection of (A'A') IDNccTLD? And if so can (A'A') request (A'A') IDNccTLD	Section 1.2.1 & 1.3.1	According to scenario A'A'IDNccTLD was delegated and hence a meaningful representation of country AA. The split of AA into AA and A'A' does not change that A'A'IDNccTLD is still a meaningful representation of AA in the Designated Language and related script. As a result A'A'IDN ccTLD still meets all the criteria, including the meaningful criteria even if SIP of A'A' would like to see it differently.	N	Confirmed second reading 2 May 2023

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Discussed Y/N?
14.	What if the script of the local language changes and the country has decided to change the script it uses?	Section 1.3.2 an d section 1.3.3	The IDN ccTLD does not meet all the criteria and the procedure of section 1.3.3 applies.	N	
15 (was 16.)	'Merger' scenario – The ASCII for West Gebied is .WG, and the abbreviated name is Gebied. West Gebied merges with South Gebied. For this South Gebied the ccTLD .SG was delegated. Under this test only South Gebied uses an IDN ccTLD in the Dutch language **.GEBIED**. After the merger .ST will be retired in accordance with the ccTLD retirement policy. What will happen with the IDNccTLD **.GEBIED**?	Principle I	The basic principle of the proposed policy is that if the reference to a **Territory** is removed from the ISO3166 – 1 standard because two or more Territories have merged, this removal is considered a "trigger event" . This will cause the initiation of the process for the retirement of **all the selected IDNccTLD(s) (and their variants),** which are a meaningful representation of the name of the **Territory**. However, if GEBIED is a meaningful representation in the Designated language of the merged Territory, and the Significantly Interested Parties of the "merged" Territory support the IDNccTLD, it should not be retired. Note that the basic criteria only one (1) IDN ccTLD string per Designated Language applies (section 1.3.2). So if there is already a IDNccTLD for the merged territory in the same	Y, adjust Principle I and possibly section 2.2 and 2.3 applies	Second reading 18 April 2023

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Discussed Y/N?
			Designated Language, GEBIED shall need to be retired.		

Variant and variant management test

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Adjusted paragraph in text
17	EPDP scenario. An IDN ccTLD seeks supports for variant set, along the way something happens with selected string, primary (i.e selected string) is no longer eligible.	Section 3.2.1 See stress # 8 Criteria (above)	If a selected IDNccTLD does not meet any of the criteria (hereafter is "not valid" or "invalid"), variants are not be calculated anymore. Note there is no general statement that if a selected string does not meet all requirements, the variants are considered not valid anymore. The CS sub-group agreed to the following: If the selected string is not valid, all related variant strings are invalid. Rationale: The selected string is considered the core or primary string. All delegatable variants strings are derived from this string through the RZ-LGR. So if the core or primary string is considered invalid, all strings that are derived from the this core or primary string should be invalid as well. And from the related Notes and Observations *It is noted that if the selected string is not valid, but a delegatable variant IDNccTLD string is valid, this string could be considered the selected IDNccTLD string, and pass. To avoid unnecessary administrative burden by renewed submission, which is always possible, ICANN is advised to accept a note confirmation that one of the delegatable IDNccTLD strings that is valid, is deemed to be the selected IDNccTLD string. The*	Confirmed in first reading that only if selected string meets all criteria the variant set is valid. This recommendation needs to made general	Confirmed in second reading 2 May 2023

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Adjusted paragraph in text
			note of confirmation shall need to be supported by the Significantly Interested Parties that support the original request.		
18.	What if IDNccTLD Manager applies for a Variant string that is not in official language of country. The IDN ccTLD managers wants to serve non-official language users. Limitation of usability by limitation of criteria?	Section 3.2.3, Annex C ICANN Bylaws	According to the proposed policy only **Allocatable VARIANTS** of the selected IDNccTLD string that are **Meaningful Representations** of the name of the **Territory** in the **Designated Language** according to section 1.1-1.8 and section 2.1 and 2.2**,** are eligible to be delegated. The national consideration which community is to be served, and hence the registration policy is out of scope of this and other ccNSO PDPs	No	Confirmed in second reading 2 May 2023
19	Asymmetrical variants. Sometimes variants are asymmetrical: if you go from label A to label B, label B is allocatable, however sometimes going form Label B to label A it is blocked. How will this play out under the policy?	Section 3.2.1& section 3.2.3	Variants are derived from the selected IDNccTLD string through the RZ-LGR. Assuming string A is the selected IDNccTLD string and string B an allocatable variant of A, then string B could be a delegatable variant of the selected IDNccTLD A if all criteria are met. However, assuming asymmetry, and string B is the selected string and string A is blocked variant of string B, then by definition variant IDNccTLD string A is non-eligible.	No	Confirmed in first reading 2 May 2023
20.	IDN1 is the selected IDNccTLD string in Chinese, and IDN2 and IDN3 are variants under Chinese RZ-LGR. IDN3 is	Section 3.2.3, 3.3	Only Allocatable VARIANTS of the selected IDNccTLD string that are Meaningful Representations of the name of the Territory in the Designated Language are eligible.	No	Second, final reading on call 30 May 2023

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Adjusted paragraph in text
	a variant in Japanese. Is IDN3 in Japanese eligible?		Therefore, if IDN3 is a meaningful representation in another Designated Language it may be requested.		
New 20 a.	IDN1 is selected IDNccTLD string in Chinese, and IDN2 is allocatable variant and IDN3 is a blocked variant under Chinese RZ-LGR. Someone applies for a string IDN3" in Japanese that looks similar to IDN3. Is the string IDN3" eligible?				See item 33
New 20 b.	IDN1 is the selected IDNccTLD string in Chinese, and IDN2 and IDN3 are allocatable variants under Chinese RZ-LGR. IDN3 is also meaningful representation in Japanese. Japanese is also a Designated Language of the country. Another applicant applies for IDN3.		Although IDN3 is a meaningful representation in another Designated Language, it is also a variant of the already delegated string IDN1. IDN3 can only be requested by the requestor of IDN1.	N	First reading 30 May 2023
21.	Assume asymmetrical variants: A-> B allocatable, B-> A is blocked as a result of the RZ-LGR.	Principle IV, Section 3.2.1 & 3.2.2,	Before RZ-LGR became effective the applicant could not request any variants. Only after a script has been integrated into the RZ-LGR variants can be calculated and hence applied for.	N, However make explicit in policy that at the time of application the	Second reading on 30 May 2023,

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Adjusted paragraph in text
	What if an applicant has applied for A first and then applies for B? What if an applicant has applied for B first, before RZ-LGR became effective, and then wants both (B and A)?		Note that the according to Principle IV the request for (and delegation) of IDNccTLDs, is an ongoing process. It is implied in the Fast Track Process Implementation Plan (FIP) (section 3.4) and section 3.2.2 of this proposed policy that variants can be requested after the selected string was delegated (including Delegatable variants of IDNccTLD strings that were delegated under the Fast Track Process). However, as implied in section 3.4 of the FIP, and 3.2.2, that a variant is only valid if at the time of application it is valid according to the RZ-LGR. If according to the RZ-LGR at the time of submission of the application of IDN ccTLD B this variant is an allocatable variant of A, B is "valid" and assuming all other criteria are met, then B is eligible. If according to the RZ-LGR at the time of submission of the application of IDN ccTLD A this variant is a blocked variant of B, then A is "not valid" and therefore not eligible. Finally, it is noted that there is an expectation that the requester and relevant community using the	rules at the time the application is submitted.	Update to clarify non-retroactive application

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Adjusted paragraph in text
			script in which the IDN ccTLD string is expressed, will have participated in the related script generation panel. This would have allowed the requester and Significantly Interested Parties to build an alternative case with respect to strings A and B .		
21 a	Same scenario as under 21, but with expectation that at the time of application and delegation of the selected IDNccTLD string, the variant would become available i.e. the variant would be "valid" under RZ-LGR?		At the time of application under the Fast Track variants were not available, however one could express an interest in a desired variant. At the same time it was made clear that ultimately the rules at the time of application of the variant of the selected string determine whether a string is valid. Under this scenario, whether or not there was an expectation that a variant would be "valid" is not relevant. Only relevant is the set of rules that is effective (including the RZ-LGR) at the time of application of a specific string, whether a selected IDNccTLD or Delegatable variant of the selected string.	See Item 21	
22.	The application of RZ-LGR makes the currently delegated ccTLDs become variant of each other. How will this play out?	Section 3.2.4, Section 9C	To date (March 2023), IDNccTLD are selected and delegated without applying the RZ-LGR. According to the proposed policy under section 9 C each of the currently delegated IDNccTLDs are grandfathered, irrespective of whether they are considered variants through the RZ-LGR. In the event a change in RZ-LGR causes a "collision" between ccTLDs, it is expected that this is pointed out to the generation panel. The generation panel is expected to share the motivation of still doing that change, to ensure all are informed.	N	Updated after second reading 16 May 2023 Support 30 May

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Adjusted paragraph in text
			See https://www.icann.org/en/system/files/files/rz-lgr-technical-utilization-recs-07oct19-en.pdf Recommendation 12.		
23.	String A has allocatable variants: A1, A2. But A1 -> A2 blocked variant and A2 -> A1 blocked variant. A, A1, A2 have all been delegated What happens if A is deselected? Can A1 and A2 remain delegated, even if they wouldn't be allowed to co-exist without the initial label A?	Section 3.2.1& 3.2.2 and 4.2.2	According to section 3.2.1 and 3.2.2 Variants of the selected sting are derived from and directly related to the selected IDNccTLD through the RZ-LGR, in other words, if no selected IDNccTLD then no variants. As a result, the de-selection of selected string A shall result in de-selection of variant strings A1 and A2. The proposal do provide for specific situation that although A is deselected, A1 may continue (see section on deselection by SIP). However, in such a case A2 also has to be retired as it is a blocked variant of A1.	To be made explicit in the policy?	Update after second reading 16 May 2023 Support 30 May
24.	Is there a need to synchronize between ccPDP4 and EPDP sets of recommendation when blocked IDN strings are involved. ~~because in the end it is going to be in IANA for the IDN variants.~~ Assume a particular IDN string is applied for	Principle IV and V, Section 1.2.3 and 3.2.3	In principle (Principle IV) the IDNccTLD selection process is open, implying there is no time limit for selection of a string in a territory and request for a IDNccTLD string or its delegatable variant. Further, according to Principle V, criteria determine the number of IDNccTLD per territory, including the number of variants to be delegated. In addition, the number INDccTLDs strings is limited to one IDNccTLD per Territory, with the	Suggestion is no change	Updated after second reading on call 16 May 2023

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Adjusted paragraph in text
	without variant, does the applicant has the right to register/ claim and refer to all the variants of the selected IDNccTLD string at a later stage?		exception of delegatable variants. If a Delegatable variant meets all the criteria (other than one string per Territory). As re-stated in section 3.2.3 only allocatable variants of the selected IDNccTLD that are a meaningful representation of the name of the country are eligible. According to the notes and observations of section 3.2.2: *For variants to be eligible for delegation, section 3.2.3 implies that all criteria apply and the required documentation and support from the Significantly Interested Parties must be available for all requested variants before validation.* Section 3.2.3 also implies that if - for example – a Delegatable variant of a selected string is considered confusingly similar to an already delegated IDNccTLD or gTLD and not associated with the same territory, it is not valid. Therefore a right to all variants cannot be assumed.		
25	How does an IDN ccTLD Manager of an already selected and delegated IDNccTLD string apply for a delegatable variant TLD - is it the same process given the primary string is already delegated?	Principle IV Section 3.2.2 and Section 5.2	According to Principle IV the request for (and delegation) of IDNccTLDs is an ongoing process. It is implied in section 3.2.2 that variants can be requested after the selected string was delegated (at least variants from IDNccTLD strings that were delegated under the Fast Track Process. All requests have to follow the same validation process as defined through section 5.2 the String Validation stage.	Make explicit that Delegatable variants can always be requested. This is implication of Principle IV and implied in section 3.2.2 transitional arrangement. However, the	Second reading support 30 May 2023

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Adjusted paragraph in text
			If as suggested letters of support are from different entities, this should be clarified by the applicant. Under the Fast Track Process, ICANN and PTI have acquired a lot of experience with these type of situations. It is therefore considered a matter of implementation (as under the Fast Track) so called conflict of forms	validation procedures also apply to request of Delegatable variants of the selected IDNccTLD string.	
26.	What if a Delegatable variant of the selected IDNccTLD string is delegated before the Selected IDNccTLD is delegated?	Principle IV, Section 3.2.3	The Notes and Observations of Section 3.2.3 imply that all criteria apply and the required documentation and support from the Significantly Interested Parties must be available for all requested variants before validation and delegation. As the ccNSO process is an open process, both in terms of requesting a an IDNccTLD string as in terms of requesting delegation of IDNccTLD strings, and all the requested strings meet all criteria, the order of delegation and delegation requests is not relevant	N	Second support 30 May 2023
27.	Assume IDN 1 is delegated. Manager IDN 1 applies for variant IDN 2. IDN2 is variant of IDN 1. Will IDN2 be eligible for delegation and can it be delegated?	Principle IV, Section 1.2.3,	The IDNccTLD process is open (see Principle IV), meaning IDNccTLD strings and their delegation can be requested any time. It is not explicitly stated that Delegatable variants can be requested any time independent, but after the request of the selected IDNccTLD string. However, note that IDN2 can only be delegated to the same ccTLD Manager.	Update the document to make explicit that Delegatable variants can be requested at the time or after the request for the selected IDNccTLD string has been submitted	Y, see also item 24, 25 and 26.

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Adjusted paragraph in text
28	Assume that as the result of an needed amendment of the RZ-LGR, an IDNccTLD string causes a demonstrably threat to the DNS and the IDNccTLD should be retired. The retirement of a ccTLD (including IDNccTLD) takes at least 5 years as of the Notice of Retirement). Given this duration of the retirement should the change to the RZ-LGR become before the retirement is effective? Should the IDNccTLD be grandfathered during this period?	Section 3.2.4 Impact of possible amendment of RZ-LGR. Retirement policy.	According to section 3.2.4 the basic rule is that he IDNccTLD should be grandfathered when the RZ-LGR is amended. Only when as a result of the change of the RZ-LGR it is demonstrated that the stability and security of the DNS is demonstrably threatened and deselection the only demonstrably measure to mitigate such a threat, such an IDNccTLD should be deselected. Note that according to the GNSO IDN EPDP, all strings should be grandfathered. However, also note that the de-selection decision only demarcates the start of the retirement process of the IDNccTLD. This process itself will take at least 5 years, and is not governed by this policy but by the retirement policy. As a result the threat to the DNS will remain during this period of retirement and prior to the removal for the DNS Root zone file. In addition, changes to the RZ-LGR take into account external influences and only become effective after an extensive public consultation. This public consultation provides opportunities to the community to advise of the potential threat caused by the proposed change of the RZ-LGR.	Adjust the proposal. The delegated IDNccTLD string and its delegated variants should be grandfathered. Aligns with GNSO IDN EPDP	Second reading 30 May 2023
29	An applicant, request a single character IDNccTLD, which meets all criteria (Meaningful,	Section 1, 2 and 4	If a string meets all criteria, nothing prevents it from being requested. However note the criteria of only	Include statement in policy that Single character IDN ccTLD strings	Second reading 16 May 2023.

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Adjusted paragraph in text
	Designated Language, supported by SIP, etc.). Is string eligible under the policy?		one IDNccTLD string per Designated Language apply. However note SAC 052 (2012) : https://www.icann.org/en/system/files/files/sac-052-en.pdf In SAC 052 two potential issues were identified: • Single Charater TLDs are more likely to cause user confusion than TLDs with more characters • Work on user confusion/string similarity and IDN variants needs to be completed, Currently, the work on confusion/ string similarity is not completed nor will it be completed in foreseeable future. Therefore the concerns raised in SAC052 are still relevant. Taking into account the need to ensure the security and stability of the DNS, the application for Single character IDNs under this proposed policy is currently deferred.	are not eligible. However also note this statement should be revisited as part of the first review of the policy.	

Confusing Similarity Tests

Item #	Scenario	Relevant sections in document	Assessment	Adjust proposed policy	Adjusted paragraph in text
30	New manager applies for a CS of incumbent's non-delegated but allocatable variant. What options are open for incumbent, what is impact of CS		The application of the new manager will go through the string validation process, including the CS evaluation. If the String Evaluation Panel finds the string confusingly similar with the already delegated string, a delegatable or other variant of the already delegated string, the requested string is not eligible. If it is not found to be confusingly similar, the string is considered valid. The incumbent has no options to object and or participate, which is in line with the basic principle around sovereignty of ccTLDs	N	First reading 30 May
31	Applicant applies for IDN 1 (the selected IDNccTLD string) and delegatable variant IDN2. IDN 3 is a blocked variant of the selected string IDN1. IDN 1 and IDN 2 are not Confusingly Similar to other strings. Assume IDN 3 is	Section 4.2.3	According to the proposed policy the requested IDNccTLD string and its delegatable variants will be in included in the Request Side of the Base for Comparison (Section 4.2.3 A) and validated on CS against the strings/labels included in the Comparison Side (Section 4.2.3 B). By definition IDN3 (the blocked variant) cannot be requested and is not included in the Request Side. Therefore no consequences.	N	First reading 30 May

	Confusingly Similar with an already delegated IDN TLD, how will this play out?				
32	The base for comparison under the ccPDP4 proposals (section 4.2.3) includes the selected string and delegatable variants at the Request side. On the Comparison Side they include both delegated and applied gTLD and ccTLDs and their variants. However, how will comparison between a ccTLD string and a gTLD label play out, given that delegatable variants of gTLDs are not defined, but only allocatable or blocked variants?	Section 4.2.3	Note that currently the proposed Comparison Side (section 4.2.3 B) of the Base for Comparison includes primary delegated IDNccTLD and gTLD delegatable IDNccTLDs variants, and TLDs in application process and secondary include allocatable and blocked variants of TLDs. Therefore, one may expect that if there is a need to evaluate IDNccTLD string(s) with gTLDs, at a minimum allocatable variants derived from gTLDs already delegated or in process are included in the base of comparison.	N	
33	IDN1 is selected IDNccTLD string in Chinese and delegated, and IDN2 is a delegatable variant and IDN3 is a blocked variant under Chinese RZ-LGR. Someone applies for a string IDN3" in Japanese that looks similar to IDN3, but is NOT a variant. Is the string IDN3" eligible?	Section 4.2.3	IDN3" is by definition included in the Request Side (4.2.3 A) of the Base for Comparison for the CS validation. IDN1 and IDN2 will by definition be included in the Comparison Side (4.2.3. B) of the Base for comparison, Secondary IDN3 is expected to be included in the Comparison Side, and in all cases the Similarity Evaluation Panel needs to provide a rationale on the in- or exclusion of the blocked variant IDN3 in the Comparison Side. Assuming IND3" is confusingly similar with IDN3, it is not valid.	N	First reading 30 May 30, 2023 See item 20 a