ISO 3166 Standard
Role of the MA

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Overview

- Why this talk & Disclaimer
- ISO Standards &Organisation
- ISO 3166 Details
- ISO 3166 Terminology
- Lifecycle of some Alpha-2 Codes
- Use of Alpha-3 Codes
- ISO 3166 Part-2

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Why this presentation?

- There is a relation between RFC 1591 and ISO 3166
  - RFC 1591 discusses IANA (TLD) delegation policies at that time
    - delegation principles
    - responsibilities of delegation managers
- Explain ISO 3166 purpose and scope
  - ISO 3166 is often referred to in discussions without proper understanding
    - eg: ISO 3166 is about names
- Standards have a life cycle
  - Laws do as well

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ccPDP-Retirement

- Life cycle of "countries"
- Triggers in ISO 3166 standard changes
- Triggers ccTLD policies as well?
  - Undefined in RFC 1591

- (Limited) Scope of ISO 3166 important for discussion

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Disclaimer & Hat

- Member of ISO 3166 MA & liaison to TC46/WG2
  - Icann delegate for ISO 3166 work
  - All opinions are mine
  - Will try to stay out of the Policy discussions
    - Still, all opinions are personal

- Using (mostly) ISO terminology in these slides

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ISO Standards

- Voluntary—No International law or treaty
- Helps to be consistent in use of objects
  - Promotes interchange of goods and ideas
    - Can also protect markets
  - Cost reductions, interchange

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ISO Organisation

- Non-governmental International membership organisation
  - One member per country
- Standardises Anything
  - Technology, Healthcare, Food safety, Business processes etc
  - Published 21884 Standards
- Cooperates with IEC (International Electrotechnical Commission)
  - JTC1 3071 ISO/IEC standards

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ISO Members

- Standard body representing a country
- Full Member
  - Votes, develops, implements & adopts
- Correspondent Member
  - Observes, implements & adopts
- Subscriber Member
  - Observes
    - Small Economies

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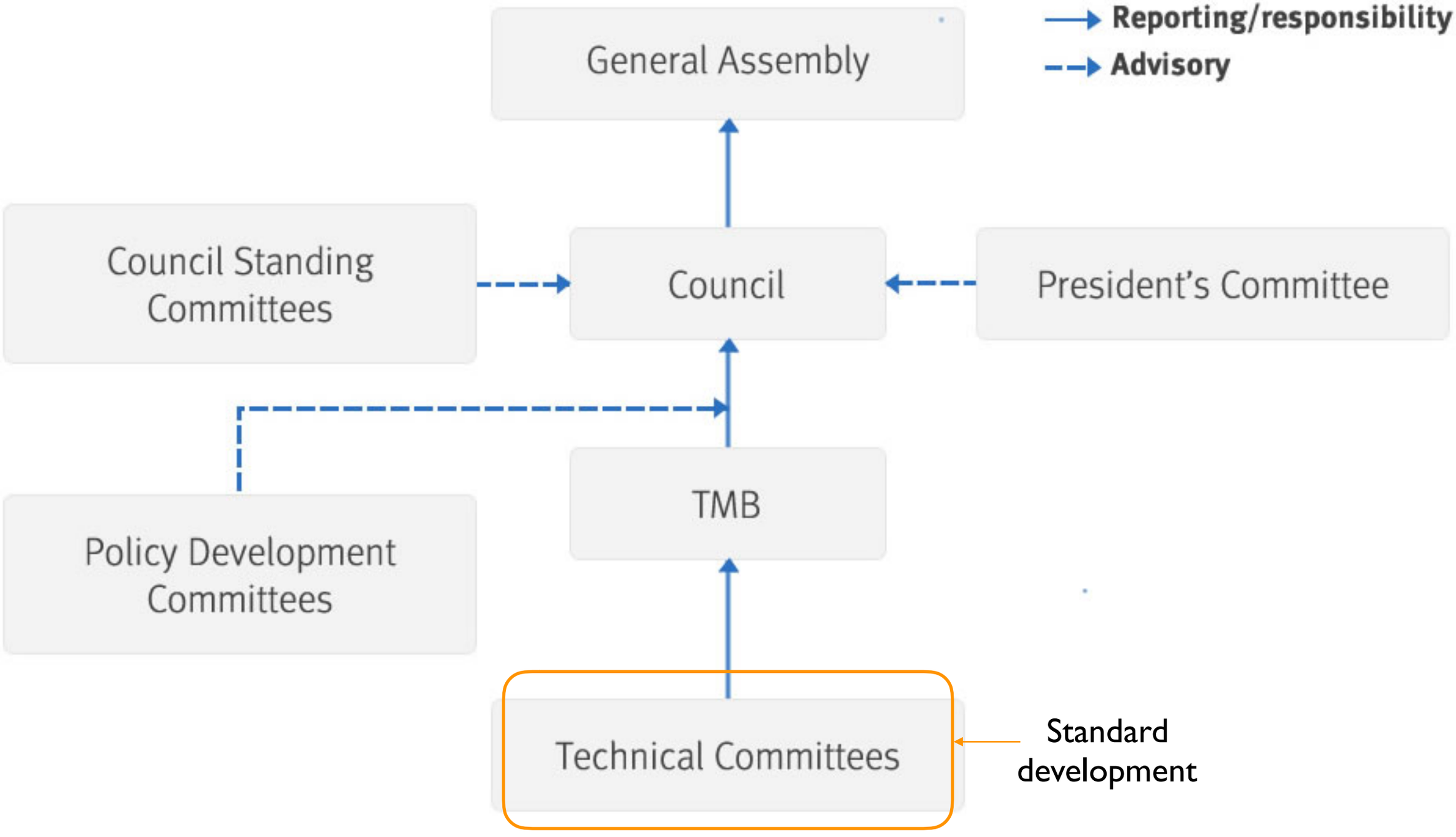
ISO governance structure



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Technical Committees

- Examples:
  - JTC 1—Information technology, together with IEC
  - TC 1—Screw heads
  - TC46—***Information and Documentation***
  - TC 176—Quality management and quality assurance
  - TC 222—Personal Financial Planning
  - TC 312—Excellence in Service

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TC 46

Information and Documentation

- Members
  - Participating: 39
  - Observing: 32
- 5 Subcommittees (SC)
- 9 Working Groups (WG)
- 2 Maintenance Agencies (MA)

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ISO/TC 46/WG 2

Coding of country names and related entities

- Is the "Owner" ISO 3166
  - Can make substantial changes of the standard
- Changes needs to be ratified by TC 46
- ± 25 members
  - ICANNs role: Liaison type D—Information only

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ISO 3166

Codes for the representation of name of countries and their subdivisions

- Part 1: Country Codes
- Part 2: Country subdivision Code
- Part 3: Code for formerly used names of countries

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“Letter” Codes

- Alpha-2 codes
  - AA to ZZ
- Alpha-3 codes
  - AAA to ZZZ
- Alpha-4 codes
  - Combination of former used codes and/or other codes

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Eligible Entities

- Independent territories
  - UN members
  - Geo political interesting areas, at the discretion of MA
    - Subdivisions Of Part 1 eligible for Part 2
- Note: All areas administrative entities
  - Not just Geographical names

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“Number” Codes

- Numeric-3 codes
  - 000 to 899
    - Not assigned by ISO but by UN Statistics Division: M.49
- Numerical representation or the ISO 3166-1 alpha-2 code elements
  - 1101 to 1876
    - (but the first “1” may omitted in closed systems)

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Code Types

(ISO 3166-1, alpha-2)

- Officially assigned (249)
- User assigned (40)
- Other Codes (407)
  - Reserved codes
    - Exceptionally reserved (12)
    - Transitional reserved (7)
    - Indeterminately reserved (30)
  - Formerly used (22)
  - Unassigned (336)

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Reservation styles

- Exceptionally reserved
  - Is an Exception so no rules
- Transitionally reserved
  - Duration of reservation is unpredictable and up to MA
  - Guideline is 50 years max.

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User-assigned code elements

- AA, QM to QZ, XA to XZ, and ZZ
- AAA to AAZ, QMA to QZZ, XAA to XZZ and ZZA to ZZZ
- numbers 900 to 999
- not guaranteed to be unique

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Purpose of 3166

Scope: for use in any application requiring the expression of current country names in coded form

country name: name of a country, dependency, or other area of particular geopolitical interest

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Uses of alpha-2 Codes

- Travel documents
  - ICAO DOC 9303 (*electronically* readable passports)
- Finance related
  - ISO 4127 (Currency codes)
  - IBAN (International bank number)
  - Swift or BIC codes
  - ISO 6166 (International Securities Identifying Number (ISIN)).

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More Uses

- Credit card companies for (local) credit cards (3166-2 codes)
- Trade related
  - UN/LOCODE—Trade and Transport Locations
  - UPU S42 and postal distribution centers
  - AS 4590-2006—Interchange of client information

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Maintenance Agency

- Body which maintains the "ephemeral" part of a standard
- Registry per ISO standard (or part of)

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MA 3166

- Maintenance of contents and editorial changes
  - Saves lengthy change process
  - Online database of some tables
    - Subscriptions available
- One (private) face to face meeting a year
  - Next: december 2017
    - Discusses Guidelines
    - Changes Part 2
    - Internal organisation

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Names & Codes

- Names mainly from UNTERM
  - They do change nice often then people expect
- Codes should have some relation to (short) names
  - There is limited choice
    - nearly all alpha-2 codes starry with S

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Code changes

- Countries do split (CS 2x)
- Major name change (RH)
- Countries merge (DD,VD)
- Territories change
  - Changes in Statehood (NL, AN)
  - Still in “limbo” (Kosovo)

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Merging countries

- German Democratic Republic
  - Now Part of entry Germany
  - DD is Unassigned, alpha-4 code: DDDE
- Viet-Nam, Democratic Republic of
  - Now Part of entry Viet Nam
  - VD is Unassigned, alpha-4 code: VDVN

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Name Change

- Zaire is now Congo, (the Democratic Republic of the)
  - ZR: Transitional reserved, alpha-4 code: ZRCD
- Upper Volta is now Burkina Faso
  - HV: Unassigned, alpha-4 code: HVBF
- Southern Rhodesia is now Zimbabwe
  - RH: Indeterminately reserved for Haiti (UN Road sign convention)

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“Splitting” Countries

- Pacific Islands split into Marshall Islands (MH), Micronesia (FM), Northern Mariana Islands (MP), Palau (PW)
  - PC: Unassigned, alpha-4 code: PCHH
- Gilbert and Ellis Islands (GE) is now Kiribati (KI) and Tuvalu (TV)
  - GE: Assigned to Georgia, alpha-4 code: GEHH
- Canton and Enderbury Islands now part of Kiribati
  - CT: Formerly used, alpha-4 code: CTKI

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Splitting CS

- Czechoslovakia (CS) into Czech (CZ) and Slovakia (SK)
  - CS: transitional reserved, alpha-4 code: CSHH

and then YU got divided …

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Splitting YU

- Name changed from Yugoslavia to Serbia and Montenegro (CS). Former Yugoslavia was divided into Bosnia and Herzegovina (BA), Croatia (HR), The former Yugoslav Republic of Macedonia (MK), Serbia and Montenegro (CS), Slovenia (SI)
  - YU transitionally reserved, alpha-4 code: YUCS
- Reuse of CS that quickly was bad idea: code still in use in various code systems

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Splitting CS #2

- Divided into Serbia (RS) and Montenegro (ME)
  - CS transitionally reserved, alpha-4 code: CSXX

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Splitting SU

- Divided into a lot (AM, AZ, EE, GE, KZ, KG, LV, LT, MD, RU, TJ, TM, UZ).
  - BY & UA were already coded
- SU exceptionally reserved, alpa-4 code: SUHH

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Statehood changes

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Dutch Antilles AN

- Aruba
- Bonaire
- Curaçao
- Saba
- Sint Eustatius
- Sint Maarten (Dutch Part)

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Dutch Antilles AN

- Aruba “status aparte” 1986 begot AW
- Bonaire
- Curaçao
- Saba
- Sint Eustatius
- Sint Maarten (Dutch Part)

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Dutch Antilles AN

- Aruba “status aparte” (1986, AW)
- Curaçao “aparte” 2010-10-10: CW
- Sint Maarten (Dutch Part) “aparte” 2010-10-10: SX

- Saba
- Bonaire
- Sint Eustatius

} 2010 BQ, BES
Special NL municipalities

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3166 alpha-3 Codes

- Assigned together with alpha-2 codes
- Has it's own list of reservations
  - not related to alpha-2 codes
- Lot's of uses
  - *Machine* readable OCR travel documents
  - With variations and additions: FIFA, IOC etc.
- Not considered in RFC 1591

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ISO 3166 Part 2

Country subdivision Code

- Subdivisions of codes assigned in Part
  - What makes a subdivision is undefined
    - Provinces, counties, autonomous {cities, regions, districts} etc…
    - Mostly administrative entities (not geographically areas)
  - Lists supplied by authorities of Part 1 alpha-2 codes
- Structure of code:
  - “alpha2” “hyphen” “other code up to four characters”
    - NL-AW Aruba (see also separate country code entry under AW)
    - NL-DR Drenthe

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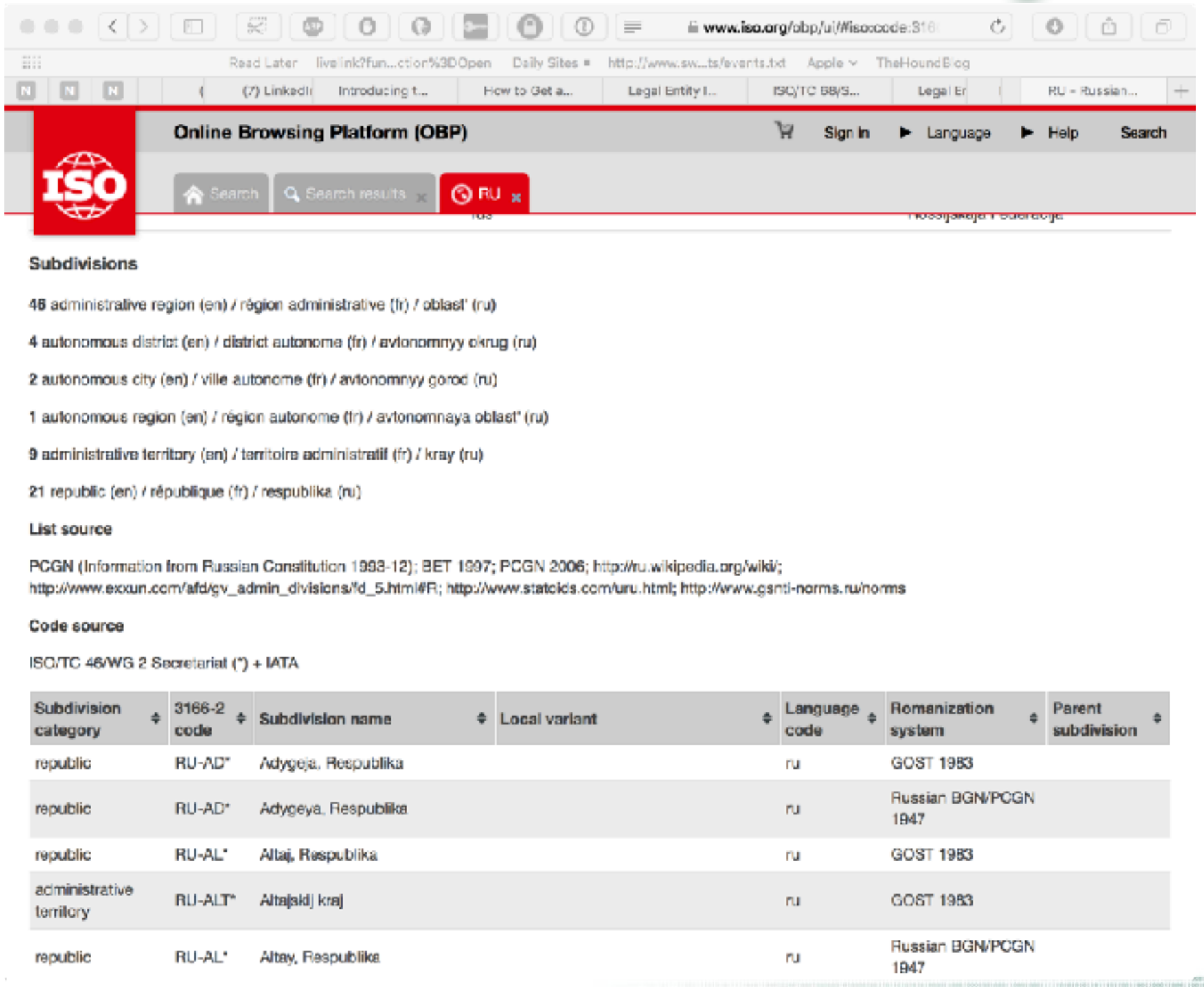
Part 2 RU entry



Subdivision category	3166-2 code	Subdivision name	Local variant	Language code	Romanization system	Parent subdivision
republic	RU-AD*	Adygeja, Respublika		ru	GOST 1983	
republic	RU-AD*	Adygeya, Respublika		ru	Russian BGN/PCGN 1947	
republic	RU-AL*	Altaj, Respublika		ru	GOST 1983	
administrative territory	RU-ALT*	Altajskij kraj		ru	GOST 1983	
republic	RU-AL*	Altay, Respublika		ru	Russian BGN/PCGN 1947	

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Some Part 2 Remarks

- Names are romanised
  - ISO system is preferred but others are in use (and change over time)
- Same names can appear in different entries
  - Naming clashes
    - Paris Texas
  - Contested areas

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Questions?

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