Proto-Celtic language

The **Proto-Celtic language**, also called **Common Celtic**, is the reconstructed ancestor language of all the known Celtic languages. Its lexis can be confidently reconstructed on the basis of the comparative method of historical linguistics. Proto-Celtic is a branch of the Western Indo-European languages, with the other branches Italic languages, Germanic languages, Albanian language and the Balto-Slavic group. The exact relationships between these branches are under discussion. The earliest archaeological culture that may justifiably be considered as Proto-Celtic is the Late Bronze Age Urnfield culture of central Europe from the last quarter of the second millennium BC.[1] By the Iron Age Hallstatt culture of around 800 BC these people had become fully Celtic.[1]

The reconstruction of Proto-Celtic is currently being undertaken. While Continental Celtic presents much substantiation for phonology, and some for morphology, recorded material is still too scanty to allow a secure reconstruction of syntax. Although some complete sentences are recorded in Gaulish and Celtiberian, the oldest substantial Celtic literature is found in Old Irish, the earliest recorded of the Insular Celtic languages.

1 Sound changes from Proto-Indo-European

The phonological changes from Proto-Indo-European to Proto-Celtic may be summarised as follows.[2] The changes are roughly in chronological order, with changes that operate on the outcome of earlier ones appearing later in the list.

1.1 Late Proto-Indo-European

These changes were shared by several other Indo-European branches.

- Palatovelars merge with the plain velars:
  - $\acute{k} > k$
  - $\acute{g} > g$
  - $\acute{g}^h > g^h$

- Epenthetic *a is inserted after a syllabic sonorant if a laryngeal and another sonorant follow ($R̥HR > RaHR$)

- Laryngeals are lost following a vowel in syllables before the accent ($VHC´ > VC´$)

- Laryngeals are lost before a following vowel, colouring its quality:
  - $h_1e > e$
  - $h_2e > a$
  - $h_3e > o$
  - $HV > V$

- Laryngeals are lost after a preceding vowel, lengthening and colouring it:
  - $eh_1 > \bar{e}$
  - $eh_2 > \bar{a}$
  - $eh_3 > \bar{o}$
  - $VH > \bar{V}$

- Syllabic laryngeals between plosives in noninitial syllables are lost ($CHC > CC$)

- All other syllabic laryngeals become *a ($CHC > CaC$)

- Two adjacent dentals become *ss ($TT > ss$)

1.2 Early Proto-Celtic

- Sequences of velar and *w merge into the labiovelars (it is uncertain if this preceded or followed the next change; that is, whether gw > b or gw > g^w):
  - $kw > k^w$
  - $gw > g^w$
  - $g^hw > g^{wh}$

- $g^w > b$

- Aspirated stops lose their aspiration and merge with the voiced stops (except that this counterfeeds the previous change, so *g^{wh} > *g^w doesn't result in a merger):
  - $b^h > b$
  - $d^h > d$
  - $g^h > g$
  - $g^{wh} > g^w$

- *e before a resonant and *a (but not *ā) becomes *a as well (eRa > aRa): *ǵʰelH-ro > *gelaro > *galaro / *gérH-no > *gerano > *garano. (Joseph's rule).

- Epenthetic *i is inserted after syllabic liquids when followed by a plosive:

  - ḷT > liT

  - ṛT > riT

- Epenthetic *a is inserted before the remaining syllabic resonants:

  - m̥ > am

  - n̥ > an

  - ḷ > al

  - ṛ > ar

- All remaining nonsyllabic laryngeals are lost.

- *p followed by *kʷ later in the word becomes *kʷ itself (p...kʷ > kʷ...kʷ)

- ē > ī

- ō > ū in final syllables

- Long vowels are shortened before a syllable-final resonant (V:RC > VRC); this also shortens long diphthongs. (Osthoff's law)

1.3   Late Proto-Celtic

- Plosives become *x before a different plosive or *s (C_1C_2 > xC_2, Cs > xs)

- p > b before liquids (pL > bL)

- p > w before nasals (pN > wN)

- p > ɸ (except possibly after *s)

- ō > ā

- ew > ow

- uwa > owa

1.4   Examples

2   Phonological reconstruction

2.1   Consonants

The following consonants have been reconstructed for Proto-Celtic:

In contrast to the parent language, Proto-Celtic does not use aspiration as a feature for distinguishing phonemes. So the Proto-Indo-European voiced aspirated stops *b^h,

*d^h, *g^h/$\acute{g}^h$ merged with *b, *d, *g/ǵ. The voiced aspirate labiovelar *g^{wh} did not merge with *g^w, though: plain *g^w became *b in Proto-Celtic, while aspirated *g^{wh} became *g^w. Thus, PIE *g^wen- 'woman' became Old Irish *ben* and Welsh *benyw*, but PIE *g^{wh}n̥- 'to kill, to wound' became Old Irish *gonaid* and Welsh *gwanu*.

Proto-Indo-European *p was lost in Proto-Celtic, apparently going through the stages *ɸ (as in the table above) and *h (perhaps attested by the toponym Hercynia if this is of Celtic origin) before being lost completely word-initially and between vowels. Adjacent to consonants, Proto-Celtic *ɸ underwent different changes: the clusters *ɸs and *ɸt became *xs and *xt respectively already in Proto-Celtic. PIE *sp- became Old Irish *s* (lenited *f*-, exactly as for PIE *sw-) and Brythonic *f*; while Schrijver 1995, p. 348 argues there was an intermediate stage *sɸ- (in which *ɸ remained an independent phoneme until after Proto-Insular Celtic had diverged into Goidelic and Brythonic), McCone 1996, pp. 44–45 finds it more economical to believe that *sp- remained unchanged in PC, that is, the change *p to *ɸ did not happen when *s preceded. (Similarly, Grimm's law did not apply to *p, t, k after *s in Germanic.)

In Gaulish and the Brythonic languages, a new *p sound has arisen as a reflex of the Proto-Indo-European *k^w phoneme. Consequently one finds Gaulish *petuar[ios]*, Welsh *pedwar* "four", compared to Old Irish *cethair* and Latin *quattuor*. Insofar as this new /p/ fills the space in the phoneme inventory which was lost by the disappearance of the equivalent stop in PIE, we may think of this as a chain shift.

The terms **P-Celtic** and **Q-Celtic** are useful when we wish to group the Celtic languages according to the way they handle this one phoneme. However a simple division into P- and Q-Celtic may be untenable, as it does not do justice to the evidence of the ancient Continental Celtic languages. The large number of unusual shared innovations among the Insular Celtic languages are often also presented as evidence against a P-Celtic *vs* Q-Celtic division, but they may instead reflect a common substratum influence from the pre-Celtic languages of Ireland, Scotland, Cornwall and Wales,, or simply continuing contact between the insular languages; in either case they would be irrelevant to Celtic language classification in the genetic sense.

Q-Celtic languages may also have /p/ in loan words, though in early borrowings from Welsh into Primitive Irish /kʷ/ was used by sound substitution due to a lack of a /p/ phoneme at the time:

- Latin *Patricius* "Saint Patrick"' > Welsh > Primitive Irish Qatrikias > Old Irish *Cothrige*, later *Padraig*;

- Latin *presbyter* "priest" > early form of word seen in Old Welsh *premter primter* > Primitive Irish qrimitir > Old Irish *cruimther*.

Gaelic *póg* "kiss" was a later borrowing (from the second word of the Latin phrase *osculum pacis* "kiss of peace") at a stage where *p* was borrowed directly as *p*, without substituting *c*.

2.2 Vowels

The Proto-Celtic vowel system is highly comparable to that reconstructed for Proto-Indo-European by Antoine Meillet. The following monophthongs have been reconstructed:

The following diphthongs have also been reconstructed:

3 Morphology

3.1 Nouns

The morphology (structure) of nouns and adjectives demonstrates no arresting alterations from the parent language. Proto-Celtic is believed to have had nouns in three genders, three numbers and five to eight cases. The genders were the normal masculine, feminine and neuter, the three numbers were singular, plural and dual. The number of cases is a subject of contention:[4] while Old Irish may have only five, the evidence from Continental Celtic is considered rather unambiguous despite appeals to archaic retentions or morphological leveling. These cases were nominative, vocative, accusative, dative, genitive, ablative, locative and instrumental.

Nouns fall into nine or so declensions, depending on the stem. There are *o*-stems, *ā*-stems, *i*-stems, *u*-stems, dental stems, velar stems, nasal stems, *r*-stems and *s*-stems.

3.1.1 *o*-stem nouns

- *makkʷos* 'son' (masculine) (Old Irish *mac* ~ Welsh and Breton *mab*)

- *dūnom* 'stronghold' (neuter)

3.1.2 *ā*-stem nouns

E.g. *ɸlāmā* 'hand' (feminine) (Old Irish *lám* ~ Welsh *llaw*)

E.g. *wolkās* 'hawker' (masculine) (Gallic *Volcae*)

3.1.3 *i*-stems

E.g. *sūlis* 'sight, view, eye' (feminine) (Brittonic *sulis* ~ Old Irish *súil*)

E.g. *mori* 'body of water, sea' (neuter) (Gallic *Mori-* ~ Old Irish *muir* ~ Welsh *môr*)

3.1.4 *u*-stem nouns

E.g. *bitus* 'world, existence' (masculine) (Gallic *Bitu-* ~ Old Irish *bith* ~ Welsh *byd* ~ Breton *bed*)

E.g. *dānu* 'valley river' (neuter?)

3.1.5 Velar and dental stems

Before the *-s* of the nominative singular, a velar consonant was fricated to *-x* and *-ɣ̊* : *rīg-* "king" > *rīɣ̊s*. Likewise, final *-d* devoiced to *-ḍ-*: *druwid-* "druid" > *druwiḍs*.[5]

E.g. *rīɣ̊s* 'king' (masculine) (Gallic *-rix*; Old Irish *rí*; Welsh *rhi*)

E.g. *druwiḍs* 'druid' (masculine) (Gallic *druis*; Old Irish *druí*)

E.g. *karnuxs* 'carnyx' (masculine?)

E.g. *karants* 'friend' (masculine) (Gallic *carant-*; Old Irish *cara*; Welsh *ceraint*)

3.1.6 Nasal stems

Generally, nasal stems end in *-on-*, this becomes *-ū* in the nominative singular: *abon--* "river" > *abū*.

E.g. *abõ* 'river' (feminine) (Welsh *afon*, Old Breton *aven*, Gaelic *abhainn*)

E.g. *anumã* 'name' (neuter) (Gallic *anuan-*; Old Irish *ainm*; Old Welsh *anu*)

3.1.7 *s*-stem nouns

Generally, *s*-stems end in *-es-*, which becomes *-os* in the nominative singular: *teges-* 'house' > *tegos*.

E.g. *tegos* 'house' (masculine), Gaelic "teach/tigh".

3.1.8 *r*-stem nouns

- *r*-stems are rare and principally confined to names of relatives. Typically they end in *-ter-*, which becomes *-tīr* in the nominative and *-tr-* in all other cases aside from the accusative: *ɸater-* 'father' > *ɸatīr*, *ɸatros*.

E.g. *ɸatīr* 'father' (masculine)

E.g. *mātīr* 'mother' (feminine)

3.2 Verbs

From comparison between early Old Irish and Gaulish forms it seems that Continental and Insular Celtic verbs were to develop differently and so the study of Irish and Welsh may have unduly weighted past opinion of proto-Celtic verbal morphology. It can be inferred from Gaulish and Celtiberian as well as Insular Celtic that the proto-Celtic verb had at least three moods:

- indicative — seen in e.g. 1st sg. Gaulish *delgu* ("I hold") Old Irish *tongu* ("I swear")

- imperative — seen in e.g. 3rd sg. Celtiberian *usabituz*, Gaulish *appisetu*

- subjunctive — seen in e.g. 3rd sg. Gaulish *buetid* ("may he be") Celtiberian *asekati*

and four tenses:

- present — seen in e.g. Gaulish *uediíu-mi* ("I pray") Celtiberian *zizonti* ("they sow")

- preterite — seen in e.g. 3rd sg. Gaulish *sioxti*, Lepontic *KariTe*

- imperfect — perhaps in Celtiberian *kombalkez*, *atibion*

- future — seen in e.g. 3rd sg. Gaulish *bissiet*, Old Irish *bieid* ("he shall be")

A probable optative mood also features in Gaulish (*tixsintor*) and an infinitive (with a characteristic ending *-unei*) in Celtiberian.[6][7]

Verbs were formed by adding suffixes to a verbal stem. The stem might be thematic or athematic, an open or a closed syllable.

Example conjugations

Scholarly reconstructions [2][8][9][10] may be summarised in tabular format.

Conjugation like *bere/o-* 'bear, carry, flow'

Conjugation like *mārā-* 'greaten, magnify, enlarge'

4 Dating

Proto-Celtic is mostly dated to roughly 800 BC (Hallstatt C), see Celtic languages.

In the first decade of the 21st century a number of scholars addressed this question using computational methods,

with differing results. Gray and Atkinson estimated a date of 6100 BP (4100 BC) while Forster and Toth[11] suggest a date of 3200 BC ±1500 years for the arrival of Celtic in Britain, but such early dates are not generally accepted.

5 See also

- Pre-Celtic

- Italo-Celtic

- Beaker culture

- Urnfield

- Halstatt culture

- La Tène culture

- Goidelic substrate hypothesis

6 References

Notes

[1] Chadwick with Corcoran, Nora with J.X.W.P. (1970). *The Celts*. Penguin Books. pp. 28–33.

[2] Ranko, Matasović (2009). *Etymological Dictionary of Proto-Celtic*. Leiden Indo-European Etymological Dictionary Series, 9. Brill Academic Publishers. ISBN 978-90-04-17336-1.

[3] Nevertheless, *C. stop + H + C. stop > Ø, in non-initial syllables. cf. PIE *d^{h}ugh$_2$té̄r 'daughter' > PCelt. *duxtīr (not **dugatīr). Matásovic (2009: 6)

[4] Pedersen, Holger (1913). *Vergleichende Grammatik der keltischen Sprachen, 2. Band, Bedeutungslehre (Wortlehre)*. Göttingen: Vandenhoeck & Ruprecht. ISBN 3-525-26119-5.

[5] *passim* in Whitley Stokes D.C.L., Hon VII. *Celtic Declension*. "Transactions of the Philological Society" Volume 20, Issue 1, pages 97–201, November 1887

[6] Stefan Schumacher, *Die keltischen Primärverben. Ein vergleichendes, etymologisches und morpho-gisches Lexikon* Institut für Sprachen und Literaturen der Univer-sität, Innsbruck (2003) (German)

[7] Pierre-Yves Lambert, *La langue gauloise. Description linguistique, commentaire d'inscriptions choisies* Paris: Errance (2003) (French)

[8] Pages xxxvi-xxxvii of MacBain, Alexander (1911) *An etymological dictionary of the Gaelic language*; Stirling: Eneas MacKay, available at http://www.archive.org/stream/etymologicaldict00macbuoft#page/xxxvi/mode/2up

[9] Pages 7-14 of Ward, Alan (1982, revised 1996) *A Check-list of Proto-Celtic Lexical Items*

[10] Examples of attested Gaulish verbs at http://www.angelfire.com/me/ik/gaulish.html

[11] Forster, Peter; Toth, Alfred (2003). "Toward a phylogenetic chronology of ancient Gaulish, Celtic, and Indo-European". *Proceedings of the National Academy of Sciences* **100**: 9079–9084. Bibcode:2003PNAS..100.9079F. doi:10.1073/pnas.1331158100. PMC 166441. PMID 12837934.

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7 External links

The Leiden University has compiled etymological dictionaries of various IE languages, a project supervised by Alexander Lubotsky and which includes a Proto-Celtic dictionary by Ranko Matasović. Unfortunately, those dictionaries published by Brill in the Leiden series have been removed from the University databases for copyright reasons. However, somebody has made an Excel file from Matasović's dictionary and uploaded on Google Docs.

Alternatively, a reference for Proto-Celtic vocabulary is provided by the University of Wales at the following sites:

- Proto-Celtic to English Wordlist (PDF)

- English to Proto-Celtic Wordlist (PDF)

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8.1   Text

- **Proto-Celtic language** *Source:* http://en.wikipedia.org/wiki/Proto-Celtic%20language?oldid=644392664 *Contributors:* Bogdangiusca, Benwing, BovineBeast, Gilgamesh, Mustafaa, Picapica, Pasquale, 4pq1injbok, Florian Blaschke, Dbachmann, Nabla, Kwamikagami, QuartierLatin1968, CDN99, Gwalarn, Anthony Appleyard, Cjthellama, Ish ishwar, NantonosAedui, Angr, Bellenion, Commander Keane, Doric Loon, Graham87, BD2412, Kbdank71, Rjwilmsi, Dewrad, Ligulem, Who, Whimemsz, YurikBot, Whozatmac, Eburaconos, Pigman, Nascigl, CecilWard, Wisconsincheddar1985, Deville, SMcCandlish, Pádraic MacUidhir, Tropylium, That Guy, From That Show!, SmackBot, Derek Andrews, Peter Isotalo, Bluebot, RDBrown, MalafayaBot, Hibernian, VikSol, Paul S, Ligulembot, FlyHigh, Soap, Marco polo, P-A., Psammead, Espreon, Pobbie Rarr, JoeBot, Sparviere, DangerousPanda, Washi, Richard Keatinge, StevePepper, Sirmylesnagopaleentheda, HJJHolm, Thijs!bot, Wachowich, Nick Number, Darekun, Flibjib8, Goldenrowley, Comhreir, MER-C, Adresia, CodeCat, Ian.thomson, VolkovBot, Ebay3, David Marjanović, Aekos, Munci, Roidhrigh, Kentynet, Attatatta, Niceguyedc, Coccionos, Addbot, Yolgnu, Download, Numbo3-bot, LarryJeff, Balabiot, Ben Ben, Luckas-bot, Yobot, Amirobot, Tuxraider reloaded, AnomieBOT, Klimenok, Citation bot, Enemydone, Linguoboy, GrouchoBot, FrescoBot, Colin Ryan, Talskubilos, Kibi78704, Nora lives, Vrenator, Beyond My Ken, EmausBot, Finn Bjørklid, ZéroBot, Primus128, Vanished user sdjei4o346jowe3, ChuispastonBot, ClueBot NG, Octavius 909, Niklas R, Dontcheat, Helpful Pixie Bot, Brikane, Bibcode Bot, Randomname3458, Dipankan001, Domrivers, Adjective Recoil, Monkbot and Anonymous: 51

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