The comparison of adjectives in Celtic presents many interesting features. Some of these are structural and grammatical, such as the restriction of the comparative to predicative position and the introduction of a fourth degree of comparison, the equative, beside the usual positive, comparative and superlative. But there are purely formal peculiarities as well. Irregularly compared adjectives are synchronically very conspicuous in Old Irish and Middle Welsh, and many of the individual irregularities that they display are also puzzling from a diachronic point of view. A case in point is the Old Irish comparative ending in *-a, the origin of which has never been satisfactorily explained.

An example of regular comparison in Old Irish is furnished by *sen ‘old’, compv. *siniu, superl. *sinem, equat. *sinithir, or, with secondary loss of palatalization, *ard ‘high’, compv. *ardu, superl. *ardam, equat. *ardithir. Apart from the equatives in *-ithir, which are clearly a late formation, the origin of these forms is well known. The comparative in *-i(h)af goes back to earlier *-i(h)os, the nom. sg. masc. of the PIE comparative suffix *-ios-/*-ios~/*-isos-. (cf. GAv. nom. sg. *spaniitiis ‘holier’: *spaniita, ‘holier’). The superlative ending -em, -am is the regular reflex of *-isamo-, *-is-amvo, the Italo-Celtic replacement of the PIE complex superlative marker *-is-to- (cf. Lat. *isamos in pigerrimus ‘laziest’, facillimus ‘easiest’, etc., beside Av. *išta-, Ved. *iś(=kš)ta-, Gk.-sitto-, Go. -iتس)2. Counterparts of *siniu and *sinem are found in Middle Welsh, where the comparative of *hyn ‘old’ is *hyn, with superlative *hyn(h)af. In Welsh the comparative in *-i(h)os is a mere relic, recurring only in *let (=OIr. laigu) ‘smaller’. The normal Brittonic comparative, continuing a late adjectival type in *-akkos or *-okkos, is represented by forms like MW tegach ‘fairer’, Co. hakcre ‘uglier’ and MBr. sclerhoch ‘brighter’, the latter two with analogical provocation from the superlative and equative.

The superlative in *-isamo-, represented by OIr. *-em, *-am and MW -(h)af, is regular in both branches. But both Goidelic and Brittonic also show a shorter variant *-isamo- in a few synchronically important cases:

1 This paper has benefited considerably from discussions with Lionel Joseph, whose help is gratefully acknowledged. All errors, of course, are my own.
2 I use the term “Italo-Celtic” to indicate my agreement with the analysis of *-isamo- presented by Cowgill (1970).
In a classic paper, Cowgill demonstrated (1970) that the absence of *-i- in these forms is an innovation, and not, as earlier claimed by Brugmann (1889: 169) and others, an archaism. This is clearest in the case of *treksamo-, *ouksamo- and *issamo-. *treksamo- is the superlative of an adjective whose positive form in Common Celtic was *treksno- (cf. OIr. trén, MW tren), consisting of a “root” *treke- and a derivational suffix *-no-. Following the archaic derivational pattern known as “Caland’s Law”, the comparison of *treks-no- was based directly on the unsuffixed root. The corresponding pre-Celtic superlative was originally *treks-ismo-,* formed in the same way as Lat. maximus < *mag-isamo- beside magnus ‘large’. As Cowgill recognized (p. 131), *treksamo- is simply a haphazardly shortened form of *treksismo-,* typologically comparable to Lat. *-isamo- ‘highest’, its Welsh counterpart, OIr. *tressam,* MW *uwchaf,* Celtib. PN *Uxama*.

The superlatives in *-(s)amo- are associated with irregular comparatives. OIr. *trén* ‘strong’ makes a comparative *tressa*; its Welsh counterpart, the comparative of *tren,* is *trec*. It is probable that these go back to a common source, even though there is no known PIE or Common Celtic comparative morpheme that would have yielded OIr. -a and MW -o. As a temporary expedient we may set up Insular Celtic preforms with an algebraic ending *-A:

*treks-A* ‘stronger’ OIr. *tressa,* MW *trec*
*ness-A* ‘nearer’ OIr. *nessa,* MW *nes*
*mess-A* ‘worse’ OIr. *mesa*
*ouks-A* ‘higher’ MW *ucoholic*
*iss-A* ‘lower’ MW *isaf*
*sass-A* ‘easier’ MW *hauisaf*

The appearance of *-A for *yūs is independent of the shape of the preceding root. This can be seen from the comparatives of three further words:

*let-A* ‘wider’ OIr. *letha* (: *lethan* ‘wide’), MW *ilet* (: *liydan*)
*yow-A* ‘younger’ OIr. *yow* (: *óac* ‘young’), MW *ieu* (: *ieuanc*)
*rem-A* ‘thicker’ NIr. *ramha* < OIr. *remo* (: *remor* ‘thick’)

Of these, the first two belong to IE word families with well-attested Caland systems outside Celtic (cf. especially Ved. *prthú* ‘broad’, compv. *práthya-*, superl. *práthistha-; yuvan- ‘young’, compv. *yuvya-*, superl. *yuvistha-).* While *rem-A has no known etymology, the presence of the suffix *-ro- in the corresponding positive form (*rem-ro-*) suggests an inherited Caland system here as well. Indeed, whatever the origin of *-A, it seems clear that the forms in which this morpheme appears constitute an archaic class with a history that reaches back, in some cases, to Proto-Indo-European itself.

Cowgill’s explanation of the comparatives in *-A is less attractive than his account of the superlatives in *-(s)amo-. Taking OIr. *letha* and MW *ilet* as his point of departure, he notes (pp. 134ff.) that PIE *pletly- ‘wide’ should originally have formed a comparative *pletly-yssey,* the Insular Celtic reflex of which, after the vocalization of *-h₂* to *-a-,* would have been

* Cf. Cowgill (p. 133). We are not well informed about the original superlatives of these words. The “regular” Insular Celtic forms would have been *letisamo-,* *yowisamo-* and *remisamo-,* but even before the separation of Goidelic and Brittonic these could easily have been replaced by *letisamo-,* *yowisamo-* and *remisamo- on the model of pairs like *treks-A* (: *treksismo-,* MW *ilet* and *ieu* (h)af) point weakly to preforms of the first type, OIr. *dám* to the second. The superlatives of *lethana* and *remor* are not attested in texts of the Old Irish period.

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1 A full account of Caland derivational “systems” in the IE daughter languages is given by Nusebaum (1976).
2 Cf. Jasanoff (1987) and the references there cited.
3 As Cowgill notes (pp. 131–2), there are reasons to think that *sassamo- may be based on a “root” *sás-. OIr. *messam* has been believed to go back to *missamo-*< *missisamo-*(cf. note 12).
The final sequence *-aus, in Cowgill’s view, was the source of both OIr. -a and MW -Θ. The change of *letaus to *let would have been perfectly normal in Brittonic, where all final syllables were regularly lost. In Old Irish, however, it is usually believed that *-aus would have given *-ōs, whence OIr. -o and slightly later -a (cf. mogo, -o < *-ou; gen. sg. of mag ‘serf’). Cowgill is consequently obliged to explain the nearly total absence of spellings of the type *leta, even in the oldest sources. He argues that the expected -o is in fact found in the phrase nesso assa nesso ‘nearer and nearer’, attested at Wb. 12b34a, and that the otherwise general suppression of -o is probably due mainly to influence from the superlatives in -am, which favored a phonetic spelling over the archaizing one more common in the [gen. sg. of] u-stems” (p. 135). He compares the -o of 2sg. pret. ciala ‘you heard’ < *kuklowas, which he takes from an immediate preform in *-ow.

None of this is very convincing. The phrase nesso assa nesso is also attested in a later text, the Voyage of Maed Duin, where it is spelled nesso ‘sa neso in Stokes’ edition (1888: 474). If this reading is correct, it suggests that nesso assa nesso was a fixed expression, perhaps modeled on mó assa mó ‘more and more’. Cowgill is too ready to interpret the contrast between early OIr. -o and -a as purely graphic; in fact, the retention of -o in the gen. sg. of i- and u-stems is far too consistent in the Würzburg Glosses to be dismissed as a mere scribal convention. Nor is it clear how the appearance of a form like messa ‘worse’ for expected *messo could have been due to analogy with the superlative messam. The synchronically ‘regular’ comparative corresponding to messam would have been *messu (cf. the pattern superl. ardam: compv. ardu), and forms of this type are in fact well attested in Middle Irish. The alleged change of *-ow to -a in 2sg. ciala is illusory: the development of the corresponding 3sg. cialae from *kuklowe shows that original *-ow(s) and *-ow(s) contracted to *-a(s) and *-e(s) in pre-Irish without an intervening diphthongal stage. In the

The possibility that nesso arose through a contamination of nessa and mó was already considered by Sommer (1900: 240, fn. 1). The phrase mó assa mó is itself probably the replacement of earlier *má assa mó, mó being the old neuter form (cf. below). At a time when both *má assa mó and mó assa mó were in use, it would have been easy for nessa assa nesso to acquire an analogical variant nesso assa nesso.

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cule in *-iwa̱ to all three genders and numbers, *messo-., according to
Kurylowicz, generalized the feminine and neuter nom. pl. messa (< *-iwa),
this being the only nominative form with a "redundant" (overt) desinence.
From messa the new ending -a was supposedly extended to deradical
comparatives like *lethiu (< *letywa) and *tressiu (< *tressywa), but not to
regular forms like sina. The whole scenario is too contrived to be convinc­
ing; even the starting point, the assumption of an inherited *messo- or
*messso- with the required meaning, is questionable.12 Kurylowicz fails to
note that the Insular Celtic precursors of letha and tressa could not actually
have been *letya and *tressywa, since these would have appeared in Welsh as
*lyt and *trych (cf. hyn < *senya). In fact, it is hard to avoid the
conclusion that forms like letha / liet and tressa / trech must already have had
a special ending — either *wa or some other sequence distinct from
*-iwa in Insular Celtic itself. From a purely phonological point of view,
*letwa, *tressa and *messsa would be perfectly acceptable preforms. But
Kurylowicz' argument for deriving the -a of messa from the ending of the
feminine nom. pl. presupposes the loss of short final syllables, a develop­
ment of the fifth century A.D. Before this date the corresponding mascu­
line nom. sg. would still have had an overt ending *wa < *wa, and there
would have been no rationale for the selection of the fem. pl. *messwa,
rather than the masc. sg. *messos (*-os), as the invariant comparative
form.

Other theories have sought to connect letha, etc. with the three ultra­
short Old Irish comparatives lia (lia) 'more' (positive il 'many'), sia (sia)
'longer' (positive si 'long'), and ma(a) 'greater, more' (positive mar, mor
'great, more'). Of these, sia has an exact counterpart in MW heuy 'longer'
(positive heir), while lia corresponds to a virtual *huy 'more', which seems
to have provided the model for the change of MW moe (OW mo) 'greater,
more' to later moey (so already Sommer 1900: 237). Since OIr. ia and MW
wy normally go back to Common Celtic *ia (< *eia), lia and sia are usually
referred to preforms *plehia-is and *sehia-is or their pre-laryngeal equiva­
12 Kurylowicz compares Germanic compounds of the type Go. missa-deha
and OHG missi-tal 'misdeed', etc., but the first element in these words probably
originally meant 'different', as in Go. missa-leiks 'of different kinds'. The thematic
adjective does not occur outside of composition; OHG missi (1 x) 'different' is a
ja-stem, while Go. misso 'mutually, each other' is an adverb.

13 Jackson (1953: 357–8) points out that MW moe, OW moi could also
have come from *maiws via the intermediate stages *maiws, *mais, *mais
and *mais. But the loss of *-i- was Common Celtic, and it does not seem very likely that
the *-a of the hiatus form *maiws would have retained its quantity long enough to
be affected by the much later Brittonic change of *i to *e.

14 Sommer uses the prelaryngeal notation *pleh-iommo, *seh-iommo. The pho­
nological treatment of these forms in Old Irish is well summarized by Cogill
(p. 136).
have been true of *má(a), which does not seem to be attested in early poetry. On the other hand, it is hardly likely that the *-a of letaha, etc. actually had its source in *lia and sia, since the latter forms, as interpreted by Sommer, owe their *-a to a diphthongization process not yet complete in the Archaic Old Irish of the Cambrai Homily (cf. 3 pl. rel. tu-thégot for do-thígot ‘which come’, fíe for fíadó ‘lord’). There is no chronological problem in the case of *má(a), which could have acquired its “tendency to disyllabic pronunciation” at any time after the contraction of *má-us < *má-ös to má. But it is inherently unlikely that the quasi-disyllabic realization of *má, as a mere phonetic variant of the monosyllabic reading, would have been sufficiently robust to induce the effects Thurknesen claims for it – especially in view of the existence of the competing form mó, with monosyllabic and disyllabic variants of its own. Sommer’s contention, accepted by Thurkesen, that endingless forms of the type *leth, *nesse, etc. were preserved in Irish until just before the literary period is not supported by any positive evidence. OIr. is and ós, which mean ‘under’ and ‘over’, not ‘lower’ and ‘higher’, are not comparatives; there is no reason to doubt that the Irish equivalents of MW is and uch, if they had survived, would have been *tías and *tías.

A fresh look at the problem is clearly called for. Insular Celtic, as we have seen, had at least two kinds of comparatives – the regular type represented by OIr. siniu and MW hym, and the irregular type of OIr. letha and MW let. The ending of the regular forms was originally *-yús < *-ös; that of the irregular forms, the *-a of our formulae reconstructions, is unknown. But the difference between the two types appears to be old. It is probably safe to assume, at least as a working hypothesis, that at the stage of Common Celtic or early Insular Celtic when regular adjectives like *seno- ‘old’ and *ardó– ‘high’ generalized the masculine ending *-yús as their sole comparative marker, Caland adjectives like *tidano– ‘wide’ and *treksno– ‘strong’ selected a different termination. This second ending – let 15

The only IE language with an unambiguous neuter nom.-acc. sg. in *-ös is Latin. Lat. *ius, however, shows every sign of being an innovation; the older neuter in *-is is still preserved in adverbs, where it escaped the leveling that replaced *-is by the strong suffix-form *-os (itself later mostly replaced by *-ös-) in the corresponding adjectives. Indo-Iranian has a nom.-acc. sg. in *gus (Ved.-ya, Av.-ia), but this ending, as the synchronically predictable counterpart of the masculine nom. sg. in *-gus (Av.-ig), need not even antedate the merger of PIE *e and *a as *a. OCS -(f)-j(e)(cf. hófj’e ‘more’, mazf’e ‘less’, etc.) is almost certainly not a direct reflex of *-os, but merely a recharacterized, overtly “neuter” substitute for the -(f)-j that would regularly have resulted from Proto-Slavic *-(f)-jas (a contamination of *-is and *-es/-*-ös) in this position. The original situation in Balto-Slavic is best seen in Old Prussian adverbs like tál(j)’s ‘further’ and tráld’-s ‘more’ (< *-is).

Only by setting up *mech- with *-k- can we account for the Oscan form, which otherwise have to be taken from *mag-ös (a desperate remedy; cf. Walde-Hofmann (1954: 14)) or from an analogical preform of the type *mech-*is. The corresponding positive was *mech-ro- which underlies OIr. mór, muhr and MW muar. A further connection with Omc. *mra- ‘renown’ (cf. Go. merian ‘proclaim’, OHG méri ‘glorious’, etc.) and Gk. *μαρκος (in ἵτημαρκος ‘spear-famed’ (?), etc.) is both formally and semantically problematic.

15 *má(a) is the commoner spelling; apart from the adverb namná, the Glosses offer only a single instance of má.

16 It may be noted in passing that the appearance of *-a for *-o in fíada has nothing to do with the later sound change of *-o to *-a, and hence cannot be used as an argument for Cowgill’s derivation of letha from *letho (cf. above). fíada is the regular Archaic Old Irish reflex of the inherited nom. sg. *véldonta. The development of *-ons (via *-an(t) and *-äs) to *-a was completely parallel to that of *-ons to *-a in the acc. pl. of pronouns and adjectives (cf. inna firia beceo ‘the small men’; the -u of firia has been influenced by the old nom. pl. (later voc. pl.) in *-ás < *-ös). Classical Old Irish fíada owes its -a to leveling with the oblique cases (cf. gen. sg. *fédot, with *-ot as in tu-thégot).

17 Taking is and ós as etymological comparatives would also rule out Pedersen’s attractive derivation (1909: 50) of is from *pěd-su: (Alb. përposh ‘below’).
being equal, it would be desirable to dispense with *meh₂-îos altogether and to seek an explanation for mâ(a) on the basis of the structurally predictable *meh₂-îs.

Such an explanation is in fact available. We can capture the obvious parallelism of lia, sia and mâ(a) by treating them as neuters in *-îs secondarily recharacterized by the productive Insular Celtic ending *-A. The proximate preforms of lia and sia, in my view, were not *lēs and *sēs but *lēs- and *sēs-; mâ(a), as a form of the same type, is best taken from *mais-A, i.e. *meh₂-îs followed by the ending of comparatives like *let-A and *treks-A. From a morphological point of view it is extremely common for opaque or hypershort forms to be redundantly resuffixed in this way; the process has already been met with in OIr. món, móa and mán (cf. above) and has a striking extra-Celtic parallel in OHG (Alemannic) mērīro, mērōro 'greater', representing the inherited comparative mērō (< *maizō < *meh₂-îs-) followed by the productive ending -īro / -ōro

20 Cf. also OPr. sen stavödsmu adder muisieson grīkans 'mit solcher oder grösseren Sünden'. As seen by Stang (1966: 268), the form muisison 'greater' is probably to be interpreted as a recharacterized form of *mAis, itself in turn a development of *mAis with analogical *-A.

21 Šco Cowgill (p. 130). Another example of the loss of secondary *-j- in an original sequence of the form *-V- is furnished by 1sg. cor.-acc. 'I saw', 3sg. acc. < *kvois-o. *kvois-e. Note also imna-n, the gen. pl. of the definite article, which despite Thurneysen (1946: 295) is surely to be taken from a preform *sindoism, with the PIE pronominal ending *-isem (cf. Ved. -eṣm, etc.). Only when preceded by a stressed vowel and followed by a weak final syllable was *-j- preserved, as in nom. gen. dat. acc. sg. gai 'spear' < *goisəs, -j-, -n, contrast acc. pl. gdu < *goisəs, with retained final syllable and loss of *-j-.

The Celtic Comparative Type OIr. tressa, MW trech

*treksano- and other Caland adjectives, was *-îs itself. Let us therefore speculate that at the period in the prehistory of Insular Celtic when comparatives ceased to be declined, certain adjectives of quantity ('much'), size ('long', 'wide', 'thick', 'large', by extension also 'strong', 'young'), and spatial position ('near', 'high', 'low'), along with a few others commonly employed as adverbs, selected the neuter in *-îs as their invariant form. In the resulting system, the great mass of regular comparatives in *-îs, originally masculine, contrasted with about a dozen old neuters:

*îsis 'lower'
*letis 'wider'
*lēs 'more'
*mais 'larger'
*messis 'worse'
*nēzdis 'nearer'
*ouksis 'higher'
*remis 'thicker'
*sēs 'longer'
*skissis 'easier'
*treksis 'stronger'
*yevis 'younger, smaller'

These forms were subsequently affected by two further developments – the replacement of postconsonantal (i.e., fully syllabic) *-îs by the ending we have written with the symbol *-A; and the later extension of *-A to the three monosyllabic forms *lēs, *sēs and *mais. The former process, which was the basic one, must now be considered in detail.

Evidence for the prehistory of *-A comes from an unlikely source. It was seen above that the Italo-Celtic superlative suffix *-isam-o is represented in Continental Celtic by place names of the type Gaul. OΣΥΣΧΩΝ and Celtib. (haplologized) Uxama, both probably meaning 'highest'. Other such forms are attested in both languages, e.g., Gaul. Rigisamo, Belisama, Celtib. Letaisama, Segisama, all of uncertain meaning. Taken as a whole, the Continental Celtic evidence accords very well with the facts of Irish and Welsh, with one important exception. The superlative of *litam-o 'wide' is twice attested in the Celtiberian city name Letaisama (in the native script l-e-Ta-i-s-a-m-a), the modern Ledeisma (cf. Untermann 1975: 22 Note that OIr. ós 'younger' may also mean 'less'. OIr. messa and MW haws do not fit into any of the above semantic categories; they may have acquired 'short' comparatives through the influence of their haplologized superlatives, which resembled those of *treks-, *ouks-, *sēs- and *nēs- (< *nēz-).
A. 68). Schmoll (1959: 45) is mistaken in claiming that *letaisama. The Celtiberian writing system has a well-attested syllabic sign for the sequence -ti/ -di-, and nothing would have been simpler than to write 1-e-Ti-á-s-a-m-a had this been the correct form. It is virtually certain that the diphthong -ai- is genuine, and that the replacement of *letaisamo- by *letaisamo- was an actual historical change in the evolution of Celtiberian.

There are basically two ways that the new form *letaisamo- could have come into being – a) through the analogical spread of the anteconsonantal full-grade *leta- < *pleth- at the expense of the antevocalic full-grade *let- (cf. Cowgill, p. 149, fn. 41); and b) through the influence of the semantically related superlative *maisamo- < *mehy-isynsgo-. The relative merits of these two approaches – we shall call them scenarios a) and b) – will be considered below. For the moment it is more important to note a separate but related linguistic fact, namely, that whatever the mechanism by which *letaisamo- supplanted *letaisamo- in the superlative, it is practically certain that this change would have been accompanied by a corresponding replacement of *letis by *letis in the comparative. This is clear under scenario a): if *letaisamo- arose from *letaisamo- through the simple substitution of *leti- for *leti-, there would have been no reason for the disyllabic root-form not to integrate into the comparative as well. But even if the -ai- of *letaisamo- was taken over from *maisamo- (scenario b), *letis would almost inevitably have come under strong pressure to assimilate to the comparative *mais. A specific factor favoring the change to *letis would have been the overshort, undifferentiated character of *-is as a comparative marker. Owing in part to its homophony with the nom. sg. of i-stem nouns and non-comparative adjectives, *-is was wholly or partly replaced by morphemes of the structure *-Vis in a number of different IE languages, including Baltic (OPr. -ais) and Germanic (*-ës (Go. -øs) < *-ë(a)is)23. Indeed, it is probably best to think of the contamination of *letaisamo- and *maisamo- if scenario b) is correct, as having started in the comparative, with *letis first changing to *letis under the influence of *mais, and the pattern *mais: *maisamo- then triggering the creation of the new *letaisamo-.

The comparative of *litano- in Celtiberian was thus in all likelihood *leis. This discovery is important, because the remodeling of *-is to *-ais, however it occurred, could just as easily have taken place in Common Celtic as in Celtiberian proper; and if *leis could in principle have been Common Celtic, it could also have been inherited into Insular Celtic. We must therefore consider how such a form would have been treated in Brittonic and Goidelic. For Brittonic the answer is simple: *leis, like *leis, would probably have lost its ending and yielded MW *let, the attested form. It is impossible, however, to be sure about the behavior of *-ais in Old Irish. In absolute austral *-ai evidently went to *-i before disappearing, as can be seen from the dat. sg. and nom.-acc. du. of *-ais- (cf. dat. sg. *tiath 'populo' < *-ai- (< dat. *-eis-22), nom.-acc. du. *tiath 'duae' < *-ai (< *-eis-22)), and above all from the feminine numeral *-i 'duae', likewise < *-ai < *-eis-22). But it is not clear that *-ais would necessarily have undergone the corresponding change to pre-Ir. *-is and OIr. *-i. The possibility of an entirely different treatment is suggested by the behavior of the phonologically parallel endings *-oi and *-ois. Simple *-oi clearly gave pre-Ir. *-i, as in nom. pl. *fr 'uir' < *wroir, while *-ois seems to have yielded *-ois (Ogam -OS; cf. Thurneysen, p. 192), whence -o, -a, in the genitive singular of i-stems (cf. sulo, -a, gen. sg. of súil 'eye'). To be sure, the change of *-ois to -o is not universally accepted; according to a common alternative interpretation (favored, e.g., by Lewis-Pedersen (1937: 172)), the -o of súlo was borrowed from the u-stems, where the genitive singular in -o goes back to *-ous. Against this view, however, is the fact that the i- and u-declensions had little if anything in common at the pre-Ogam linguistic stage when the transfer of *-ois from the u-stems to the i-stems would have to take place25. There is nothing inherently implausible about the sound change *-ois > *-ois; it simply asserts that the diphthong *oi lost its final glide and compensatorily lengthened its first element in closed final syllables. Acceptance of the *-ois > *-ois rule would allow us to make a prediction about the treatment of *-ais in Old Irish: with loss of the glide and compensatory lengthening, *-ais would have yielded *-aís, whence OIr. *-ais, in short, would have given leitha.

The sequence *-ais thus emerges - somewhat surprisingly, perhaps - as a candidate for *-á. The question that must now be asked is whether our hypothetical *leis, a form posited for Celtiberian but potentially referable to Common Celtic, was unique, or whether it is legitimate to go further

23 Similarly, Slavic (OCS) has -di, -ši < *-ë((j)i)ši- beside the simpler -i, -ši < *-((j)i)ši-.

24 So far as we can tell, *-ai gave *-i in Brittonic. The Middle Welsh counterpart of OIr. *di 'duae' is dwy, which can only go back to a secondarily stressed form of *dë, itself the unstressed reflex of inherited *dë(ø)ai. The direct reflex of stressed *dë(ø)ai, of course, would have been *dëe.

25 The apparent parallel of the Sanskrit i-stem loc. sg. in -au, an obvious borrowing from the u-stems, is misleading. The Indo-Iranian endings were *-ái and *-áu, both of which had a sandhi variant *-á before consonants. The partial convergence of the i- and u-stem forms was crucial: when -au began to replace *-á before consonants in the u-stems, speakers could easily misinterpret the process as one of replacing *-á by *-uai in both declensions. The language of the Rigveda preserves *-á only in i-stems.
and set up *treksais, *messais, *yowais, etc. to account for the remaining Insular Celtic forms. Under scenario a), the first of our two theoretically possible mechanisms for explaining the diphthong *-ais-, the reconstruction of a general comparative type in *ais would necessitate a cumbersome extra hypothesis: we would have to assume two analogical processes, one that substituted the anteconsontal root shape *leta- for *alet- in *letis, and another that mechanically replaced the anif suffix *is by the set suffix *ais in forms like *treksis and *messis. Scenario a), however, is suspect in any case. It is easy to conceive of the spread of *leta- in purely thematic terms, but extraordinarily difficult to think of a specific locus from which an allomorph of this shape could plausibly have invaded the comparative and/or superlative26. Scenario b) is altogether preferable, both because it provides an inherently more plausible explanation of *letais itself, and because it allows us to posit *letais, *treksais and *messais as outputs of one and the same change. Let us therefore hypothesize that at a stage of Common Celtic following the fixation of *letis, *treksis, *messis, etc. as invariant comparatives, postconsonantal *-is was everywhere replaced by *ais under the influence of *mais. The contamination process would have been facilitated by the fact that the synchronic analysis of *mais (positive *ma-ro-) after the loss of laryngeals would probably have been *m-ais rather than *ma-is, just as the synchronic analysis of *lës 'more' and *sës 'longer' (positive * ss-ro-) would almost certainly have been *lë-is and *së-is, respectively27. The sequence *ais, as the characteristic termination of the comparative form par excellence, would thus have been well positioned to encroach upon the domain of the undercharacterized *-is. Similar replacements can be cited from other languages; compare the creation, under less favorable circumstances, of Homeric χερδον 'worse' on the model of χερδον 'better', or (in the same semantic sphere as the Celtic forms) Attic inscriptional βαλεσον 'smaller' on the model of χαλεσον (< *meg(h) yês) 'larger'. A formally parallel but independent case in Celtic is perhaps to be seen in the problematic Old Irish form (h)tre 'longer, further', which can be thought of as an old comparative adverb *Ir is (< *pr- is), altered to *sës under the influence of the nearly synonymous *sës28.

26 The positive *letais-, with its zero-grade root vocalism, would hardly have been a good starting point for the propagation of the full-grade variant *leta-. A better source would have been Cowgill's masculine comparative *letayais - if, despite appearances, laryngeals had vocalized before *-i-.

27 Or *le-is and *se-is, if the monophthongization of *ei to *ë had not yet taken place.

28 That tre was synchronically felt to be a comparative is clear from the recharacterized form ire or ireis (cf. Thurneysen, p. 237) and the superlative hirem. For the root etymology compare OHG furir ‘more eminent, weightier’ (< *more in front’); the derivational basis of the Celtic form was perhaps an adverb akin to Hitt. pêran ‘in front (of)’. Thurneysen’s opinion notwithstanding, it is most unlikely that the -e of ire goes back to *-jos.

29 Nevertheless, the possibility of an Insular Celtic *aisamo- cannot be absolutely excluded. In Irish this sequence would presumably have first given *aam, whence -am by syncope; an inherited *yewaisamo- ‘youngest’ would thus have yielded the attested aam (cf. note 6). In Brittonic, it is not out of the question that *yewaisamo- and *letaisamo- would have given MW ieu(h)am and ieltiam directly, but some combination of sound change and analogy would probably have produced these forms in any case.

These observations amount to the rudiments of a new theory, which may be summarized as follows. The contrast between the types *iniu, ardu and *lettia, *tressa originated in Common Celtic. The vast majority of Common Celtic adjectives selected the originally masculine ending *-yês < *-ôs as their invariant comparative suffix, but about a dozen Caland adjectives, probably owing to their frequent use as adverbs of degree, instead generalized the neuter ending *-is. This morpheme did not survive as such, but was replaced by the *ais of *mais ‘larger, more’ within the common period. In Continental Celtic our only evidence for *ais as a comparative suffix comes from Celtiberian, where *letais and other unattested forms of the same type evidently induced the replacement of *aisamo- by *aisam o- in the corresponding superlatives. This development did not extend to the hapologized superlatives in *-(s)amo-; we find *letaisamo- (cf. Letaisama) for *letisamo-, but not *ouksaisamo- for *ouksamo- (Celtib. Uxama). Insular Celtic offers no evidence for *aisamo-, which is therefore probably best regarded as a dialectal innovation specific to Celtiberian20. But Godic and Brittonic inherited and maintained the comparative suffix *ais, eventually even extending its use to recharacterize the three monosyllabic forms *mais, *lës and *sës. The creation of *maisais, *tessais and *sësa is impossible to fix chronologically; it must, however, have been later than Common Celtic, since the creation of Celtib. *letaisamo- from *letais could only have been modeled on the pattern *mais (not *maisais): *maisamo-. The sequence *ais (the *-A of our preliminary reconstructions) was regularly lost in Brittonic forms of the type MW let, trech, etc.; in Old Irish it gave -a, whence the type leta, tresa and the originally disyllabic lia, sia and màd. The form nessa ‘nearer’, for expected *nedda < *nezzais, is an obvious analogical formation on the model of the superlative nessam < *netsam o- < *neddisamos.

That not every step in the above account can be independently proved or documented is self-evident. The pivotal forms for our theory are OIr. má(a) and Celtib. Letaisama. The former, when correctly analyzed as *mais-A, establishes *mais for Common Celtic and eliminates the evidence for a Celtic neuter comparative in *-jos; the latter shows that at least one Continental Celtic language had a comparative in *ais corresponding to
a whole series of such forms; our decision to change as under the influence
of interest in the Goidelic and Brittonic equative provides an interesting
further illustration of the special role played by the Caland system of comparison. The basic facts are well known. The attested equative constructions are based on a deadjectival abstract noun which
was reinterpreted as a special form of the corresponding adjective. A phrase like OIr. fer as déinhthir Coin Cualinn 'a man (who is) as swift as Cu Chulainn' reflects an earlier syntax of the type 'a man who is with/swiftness like unto C.C.'; the use of the accusative after déinhthir (; diann 'swift') is historically of a piece with the accusative of amail 'like, as'. The link between equatives and abstract nouns is synchronically palpable in Brittonic, where, e.g., a form like MW cochet 'as red as' ('coch 'red') is still freely employable as a noun with the meaning 'exceeding redness'. Comparison of MW, MB. -(h)-et with OIr. -eth makes it clear that the productive suffix for making "equative nouns" was originally -set- followed by an indeterminate vowel; the Irish forms have added a palatalized -r.

A suffix of the form -*iset-, -*iset- or -*iset- cannot have been inherited from Proto-Indo-European. A morpheme boundary must once have stood after the -*s-: -*is- can only be the zero-grade of the comparative morpheme, while -*eto- (vel sim.) represents the abstract-forming suffix proper. Insular Celtic preforms like *seniseto- 'older-ness, very old-ness' are analogical in origin. Their creation was doubtless triggered by the Caland adjectives in root-final *s-, which regularly formed deradical abstractions of the type *treks-eto- 'strength' and *ouks-eto- 'height'. The synchronic association of *treks- and *ouks- with the comparative and superlative probably led to the evolution of a distinctive nuance ('great strength', 'great height') in these words. The resulting pattern was then generalized: since *trekseto- and *oukseto- appeared to be made from the (haplologized) superlatives *treksamo- and *ouksamo- by substituting -eto- for -amo-, new forms in *iseto- were supplied to superlatives of the regular type in *isamo-. The proportion was *treksamo-:*trekseto-:*seniseto-:*X, where X was solved as *seniseto-. A close structural parallel is provided by the rare neuter ni-stem sinet 'old age' < *senisant, an obvious creation on the basis of nouns like treisait 'strength' < *treksant.

The source of the -r in OIr. déinhthir and simithir was seen in principle over forty years ago by Bergin (1946). *iseto- is by far the commonest device for forming equatives in the Insular Celtic languages, but it is by no means the only one. In Old Irish the equative of *mario- 'large' is mair < *mari, a case form - the genitive, perhaps - of the substantivized neuter *mario- (OIr. mór) 'large size, amount'. A similar form, first recognized as old by Bergin, is reimir < *remari (BDD), probably based on the corresponding substantivization of *remari- (OIr. remor) 'thick'. In addition to these two equatives in simple -r, Irish inherited a third - lir 'as many as', descriptively the equative of il 'many', but historically a palatalizing case form of ler 'great number'. The influence of mair, reimir and lir (or *mari, *remari and *lir) evidently triggered the extension of -r (*-r to every other equative in the language. First to undergo the change, perhaps, was leithir 'as wide as', built according to the proportion compv. *rema : equat. reimir : compv. leitha : equat. X. Another early creation was sithir 'as long as', properly a case form of the noun sith (= MW hpt) 'length' with added -r. The final step, assisted by the presence of the surface sequence -thir (or *-tr) in leithir and sithir (or *leetir and *sthir), was the spread of the innovation to the general type in *-i-seto-. Whether the actual change was one of *-s to *-tr, *-i-th to *-ith, or something in between, the result was the establishment of the familiar simithir, tresithir, etc., to which were eventually added regularized leithithir and sithithir. Like

31 Cf. Thurneysen, p. 167. Also attested as leithet 'breadth' and remet 'thickness' < *letant, *remant, with *ant < *-ad.
32 Here as in the adjective proper, -d- was substituted for -d- under the influence of the comparative mò. In principle, the case form of the equative noun could also have been a descriptive instrumental in *s < *-i-h1, the so-called "cor-formation" of Vedic Sanskrit (cf. Schindler (1980)).
33 The linguistic value of leithir and sithir (both also BDD) is correctly upheld by Bergin contra Thurneysen (p. 235). The absence of raising in reimir and leithir is no doubt analogical.
the propagation of \(-a < *-ais\) in the comparative, the spread of \(-r < *-ri\)
in the equative was determined by a small nucleus of conspicuous but
highly irregular forms.

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