

Annex A

2) Earlier comment was , these two matras looks like Gurumukhi matras 'u' U+0A41 & 'uu' U+0A42, so we can use same in Kashmiri Language also, but that solution has many problems.

1. The Gurumukhi shape it not same as require in for Kashmiri language. See Fig 3, 4 and 5



Fig 3

ਰੁ ਭੁ ਖੁ ਮੁ
lohit punjabi font

Fig 4

ਅ ⇒ written as ਅ when first letter of a word,
as in ਅਹੁਦਾ ûhûdî (*enemy / chasers*)

⇒ written as ਂ when not first letter of a word,
as in ਗੁਰ gûr (*sudden display of energy*),
ਬੁ bû (*I, me*), ਖੁਰ Khûr (*slip*)

Fig 5

ਅ ⇒ written as ਅ when first letter of a word,
as in ਅਠ੍ਹਾ ਉੱਠਿ ਉੱਠਿਮ
ਅਠਿਮ ਉੱਠਿਮ (*eight times*)
ਅਠਿਮ ਉੱਠਿਮ (*eighth*)

⇒ written as ਂ when not first letter of a word,
as in ਕੁੱਠਿ ਕੁੱਠਿ (*how many ?*), ਤੁਰ ਤੁਰ (*cold*)

Fig 6

Figures 3,4,5 and 6 are taken from book 'Basic Readed for Kashmiri Language by m.k.Raina & Neelam Trakru' and gurumukhi unicode chart.

Gurumukhi	Kashmiri
matras u & uu are horizontally very straight	matras are bents in middle
horizontal length is more than Kashmiri matras, same width as consonent.	horizontal length is short, lesser than length of consonent

2. Gurumukhi ੁ is for sound 'U' & ੂ is provides sounds 'U'. We need a characters for sounds 'û' & 'ü'.
3. Using characters of gurumukhi Script in devanagari script is very problematic for NLP Operations. Identification of Script will be problematic.
4. Rendering Engine(Pango, ICU & Uniscribe) Doesn't supports mixing of script for one language, as they treats each script differently. Also they are treating these mix characters of different script as different syllable (Bramhi Script).
<http://kaulonline.com/kalusa/koshur/unicode.htm>
5. Using Only these two matras will not solve the problems since kashmiri language require corresponding charactersfor vowels also. Since as per rule of bramhi script syllable we can combine matras to the vowels. Therefor we need four codepoint, two for vowels and two for corresponding matras.