Names for IN (ISBT 023) Blood Group Alleles

General description: The IN blood group system consists of 4 antigens carried on a glycoprotein (CD44) of 361 amino acids. It has a leader sequence of 20 amino acids that is sometimes cleaved. The protein is found in many different tissues and multiple tissue-specific isoforms of CD44 exist. The haemopoietic form is approximately 80kDa and encoded by exons 1-5, 15-17, 19.

Gene name: *IN*

Number of exons: 19

Initiation codon: Beginning of exon 1

Stop codon: End of exon 19

Entrez Gene ID: 960

GenBank #: NG_008937.1 (genomic)
NM_001001391.1 (transcript)

Reference allele: *IN*02* (shaded)
Acceptable: *IN*B*, or In^b if inferred by haemagglutination

*IN*02* encodes In^b, INFI, and INJA				
Phenotype	**Allele name**	**Nucleotide change**	**Exon**	**Predicted amino acid change**
In(a+b–)	*IN*01* or *IN*A*	c.137G>C	2	p.Arg46Pro
In(a–b+)	*IN*02* or *IN*B*			
IN:–3 or INFI–	*IN*02.–03*	c.255C>G	3	p.His85Gln
IN:–4 or INJA–	*IN*02.–04*	c.488C>A	5	p.Thr163Lys
IN: –5 or INRA–	*IN*02.–05*	c.449G>A	5	p.Arg150His