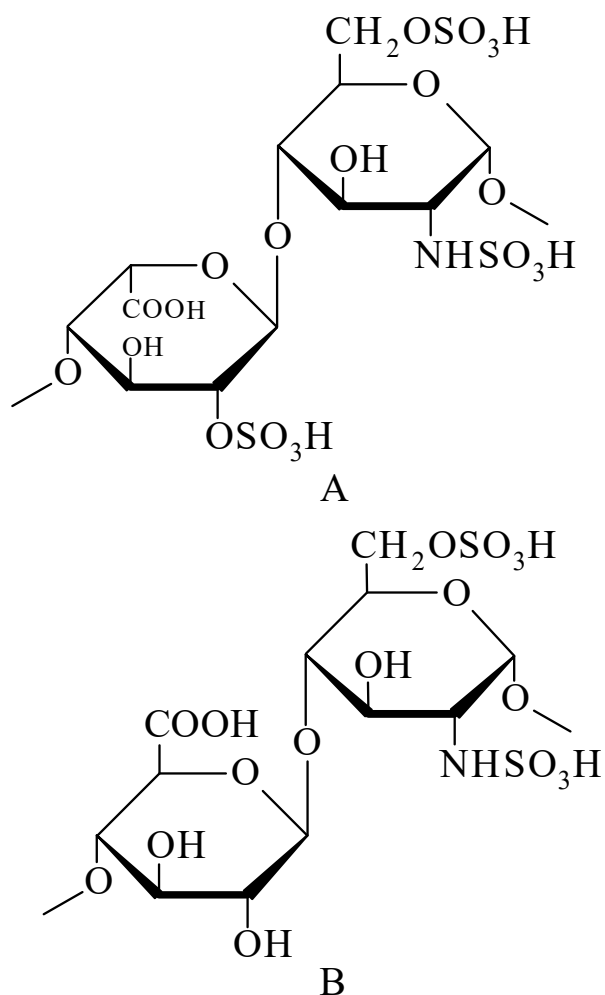




>>Entry Name: **Heparin**, 9CI, 8CI, BAN, USAN

Synonym(s): Heparinic acid. Fragmin. Pabryn. Many other names



CAS Registry Number: 9005-49-6

Related CAS Registry Numbers(s): 9045-22-1

glucose 6-sulfate while B is D-Glucuronic acid β -(1 $\rightarrow$ 4) linked to 2-Deoxy-2-sulfamido-D-glucose 6-sulfate. MW 5000-15000. See also 2-Amino-2-deoxy- α -D-glucopyranosyl-(1 $\rightarrow$ 4)- β -D-glucopyranosyluronic acid-(1 $\rightarrow$ 4)-2-amino-2-deoxy- α -D-glucopyranosyl-(1 $\rightarrow$ 4)- α -L-idopyranosyluronic acid-(1 $\rightarrow$ 4)-2-amino-2-deoxy-D-glucopyranose [NZX09-X](#)

Biological Source: Occurs in the blood, skin, aorta, umbilical cord and in most tissues and is supposedly manuf. by the mast cells

Use/Importance: Has anticoagulant and thrombolytic action. Used in the manuf. of blood-compatible polymers for use as prosthetic materials

Optical Rotation: $[\alpha]_D +44$ (H₂O)

Other Data: A variable fraction of the heparin chains are linked to serine or small peptides and contain the specific carbohydrate-protein linkage region ($\rightarrow$ GlcUA $\rightarrow$ Gal $\rightarrow$ Gal $\rightarrow$ Xyl $\rightarrow$ Ser) identical with that found in several other connective tissue polysaccharides. The presence of this linkage region suggests that Heparin is synthesised *in vivo* as a proteoglycan

Hazard & Toxicity: LD₅₀ (rat, orl) 1950 mg/kg

>>Derivative: Na salt

Synonym(s): **Heparin sodium**, BAN, INN, USAN. Hepsal. Liquaemin sodium. Monoparin. Uniparin

CAS Registry Number: 9041-08-1

Optical Rotation: $[\alpha]_D^{25} +47$ (c, 1.5 in H₂O)

Other Data: Component of numerous preparations

Hazard & Toxicity: Human systemic effects by subcutaneous route (altered perception, haemorrhages, skin reactions *inter alia*). Exp. reprod. effects

Fluka: 51537

Sigma: H3024

>>Derivative: Ca salt

Synonym(s): Calciparin. Heparin calcium. Minihep calcium

CAS Registry Number: 37270-89-6

Other Data: Component of numerous preparations

Fluka: 51542

Sigma: H9768

References: