



Hyaluronic Acid Binding Protein (HABP)

Code Number: 400762

Size: 0.1mg/vial

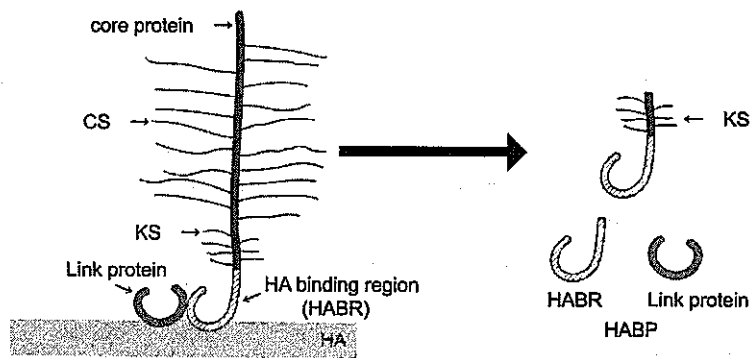
Source: Bovine nasal cartilage

Country of Origin: Australia

Description: Purified cartilage proteoglycans bind specifically to hyaluronate to form high-molecular weight aggregates in which many proteoglycans are bound to each hyaluronate chain. The proteoglycans bind by a specific site at one end of the protein backbone that is largely devoid of glycosaminoglycan chain (HA-binding region) and has a high affinity for a decasaccharide unit of hyaluronate^{1, 2}.

The link protein³ is an integral part of the aggregate structure and has been proposed to form additional bonds, by bridging the proteoglycan molecule and the hyaluronate chain, thereby increasing the strength of binding and giving a more stable aggregate structure (ternary complex)^{4,5}. Purification of hyaluronic acid binding protein (HABP) from bovine nasal cartilage was performed in accordance with the modified method of E- Laurent et al.⁴. HABP gave 2-3 broad bands (70-80kDa, 45kDa and 40-45kDa) that can be bound specifically to hyaluronic acid and keratanase treatment HABP gave 2-3 broad bands (70kDa, 45kDa and 40-45kDa). This suggests that component (70-80kDa) of HABP may contain keratan sulfate. Therefore, HABP may consist of 3 fragments (first with keratan sulfate, second without keratan sulfate and third link protein) that are present in proteoglycan aggregate preparation.

Postulated Model of HABP:



Specifications:

Appearance	Lyophilized powder
Stabilizer	None
Preservative	None
Reconstitution	Disolve the lyophilized powder with 200µL of distilled water.
Constituent	3 molecular proteins that can be bound specifically to hyaluronic acid.
Molecular weight	70-80kDa, 45kDa and 40-45kDa

Application: ELISA⁸⁻¹⁰, Histochemistry¹¹⁻¹⁴

Storage: Store at -20°C until opened. Following reconstitution, aliquot and freeze (-20°C).

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Note: For *in vitro* research use only, not for diagnostic or therapeutic use. This product is not medical device.