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(54) Title: MUCOADHESIVE HYDROPHILIC COPOLYMERS AND USES THEREOF

(57) Abstract: The invention is generally related to a class of water-soluble hydrophilic copolymers each of which comprises a small mole percentage of repeating monomeric units of at least one arylborono-containing vinylic monomer having a pKa of from about 6.4 to about 7.8 and a majority amount of repeating monomeric units of at least one hydrophilic vinylic monomer. The water-soluble hydrophilic copolymers can interact strongly and reversibly with membrane-bound mucins in the eye. When being used in an ophthalmic composition, they can function as a mucoadhesive hydrophilic polymer for prolonging the retention of demulcents and other drugs/comfort agents and also as active ingredients/lubricants due to their high hydrophilicity.