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(71) Applicant: ALTEON INC. [US/US]: 170 Williams Drive, Ramsey, NJ 07446 (US). ✓		Published With international search report. Before the expiration of the time limit for amending the claims and to be republished in the event of the receipt of amendments.	
(72) Inventors: ULRICH, Peter, C.: 148 DeWolf Road, Old Tappan, NJ 07675 (US). WAGLE, Dilip, R.: 731 Route 9W, Cottage No. 4, Valley Cottage, NY 10989 (US).			
(74) Agents: RENDA, Barbara, L. et al.: Klausner & Jackson, 411 Hackensack Avenue, Hackensack, NJ 07601 (US).			

(54) Title: N-ACYLAMINOALKYLHYDRAZINECARBOXIMIDAMIDES

(57) Abstract

The present invention relates to compositions and methods for inhibiting nonenzymatic cross-linking (protein aging) using compounds of formula (I), wherein alk is a straight or branched chain alkylene group containing from 2 to 8 carbon atoms, and R is a lower alkyl group containing from 1 to 6 carbon atoms; and their biologically or pharmaceutically acceptable acid addition salts. Accordingly, a composition is disclosed which comprises these acylaminoalkylhydrazinecarboximidamides, which are capable of inhibiting the formation of advanced glycosylation endproducts of target proteins. The method comprises contacting the target protein with the composition. Both industrial and therapeutic applications for the invention are envisioned, as food spoilage and animal protein aging can be treated.

