

Product Information

Amyloid b-peptide (1-43) (human)

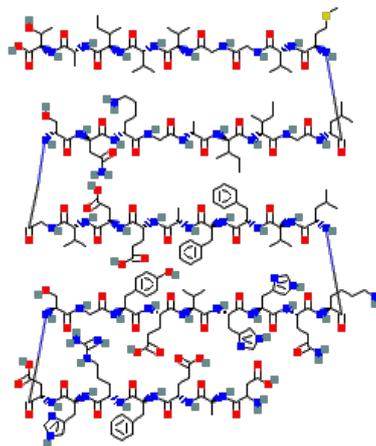
Cat. No.: X23-12-YM249

Size: 0.5 mg; 1 mg; 5 mg; 10 mg

CAS Number: 134500-80-4

PubChem CID: 71581491

Synonym: 134500-80-4; H-DL-Asp-Ala-Glu-Phe-Arg-His-Asp-Ser-Gly-Tyr-Glu-Val-His-His-Gln-Lys-Leu-Val-Phe-Phe-Ala-D-Glu-D-Asp-D-Val-Gly-D-Ser-D-Asn-D-Lys-Gly-D-Ala-D-xille-D-xille-Gly-D-Leu-D-Met-D-Val-Gly-Gly-D-Val-D-Val-D-xille-D-Ala-D-xiThr-OH



This product is for research use only and is not intended for diagnostic use.

Product Information

Description	Amyloid b-peptide (1-43) (human) interferes with or suppresses the transmission of signals between neurons in the nervous system.
Molecular Weight	4615.15
Molecular Formula	C ₂₀₇ H ₃₁₈ N ₅₆ O ₆₂ S
IUPAC Name	(4S)-5-[[[(2S)-1-[[[(2S)-1-[[[(2S)-1-[[[(2S)-1-[[2-[[[(2S)-1-[[[(2S)-1-[[[(2S)-1-[[[(2S)-1-[[[(2S)-1-[[[(2S)-5-Amino-1-[[[(2S)-6-amino-1-[[[(2S)-1-[[[(2S)-1-[[[(2S)-1-[[[(2S)-1-[[[(2R)-1-[[[(2R)-1-[[[(2R)-1-[[2-[[[(2R)-1-[[[(2R)-1-[[[(2R)-1-[[[(2R)-1-[[[(2R)-1-[[[(2R)-1-[[[(2R)-1-[[[(2R)-1-[[[(2R)-1-[[[(1R)-1-carboxy-2-hydroxypropyl]amino]-1-oxopropan-2-yl]amino]-3-methyl-1-oxopentan-2-yl]amino]-3-methyl-1-oxobutan-2-yl]amino]-3-methyl-1-oxobutan-2-yl]amino]-2-oxoethyl]amino]-2-oxoethyl]amino]-3-methyl-1-oxobutan-2-yl]amino]-4-methylsulfanyl-1-oxobutan-2-yl]amino]-4-methyl-1-oxopentan-2-yl]amino]-2-oxoethyl]amino]-3-methyl-1-oxopentan-2-yl]amino]-3-methyl-1-oxopentan-2-yl]amino]-1-oxopropan-2-yl]amino]-2-oxoethyl]amino]-1-oxohexan-2-yl]amino]-1, 4-dioxobutan-2-yl]amino]-3-hydroxy-1-oxopropan-2-yl]amino]-2-oxoethyl]amino]-3-methyl-1-oxobutan-2-yl]amino]-3-carboxy-1-oxopropan-2-yl]amino]-4-carboxy-1-oxobutan-2-yl]amino]-1-oxopropan-2-yl]amino]-1-oxo-3-phenylpropan-2-yl]amino]-1-oxo-3-phenylpropan-2-yl]amino]-3-methyl-1-oxobutan-2-yl]amino]-4-methyl-1-oxopentan-2-yl]amino]-1-oxohexan-2-yl]amino]-1, 5-dioxopentan-2-yl]amino]-3-(1H-imidazol-4-yl)-1-oxopropan-2-yl]amino]-3-(1H-imidazol-4-yl)-1-oxopropan-2-yl]amino]-3-methyl-1-oxobutan-2-yl]amino]-4-carboxy-1-oxobutan-2-yl]



amino]-3-(4-hydroxyphenyl)-1-oxopropan-2-yl]amino]-2-oxoethyl]amino]-3-hydroxy-1-oxopropan-2-yl]amino]-3-carboxy-1-oxopropan-2-yl]amino]-3-(1*H*-imidazol-4-yl)-1-oxopropan-2-yl]amino]-5-carbamimidamido-1-oxopentan-2-yl]amino]-1-oxo-3-phenylpropan-2-yl]amino]-4-[[*(2S)*]-2-[(2-amino-3-carboxypropanoyl)amino]propanoyl]amino]-5-oxopentanoic acid

InChI InChI=1S/C207H318N56O62S/c1-29-107(20)166(199(317)224-92-151(273)232-132(72-99(4)5)185(303)242-131(67-71-326-28)183(301)255-160(101(8)9)197(315)222-88-148(270)219-89-153(275)254-162(103(12)13)202(320)259-165(106(18)19)203(321)262-167(108(21)30-2)204(322)231-113(26)173(291)263-169(114(27)266)206(324)325)261-205(323)168(109(22)31-3)260-172(290)110(23)228-149(271)90-220-175(293)124(52-41-43-68-208)237-192(310)141(82-147(212)269)248-196(314)145(95-265)234-152(274)93-223-198(316)161(102(10)11)256-195(313)143(84-159(286)287)249-181(299)129(61-65-155(278)279)236-171(289)112(25)230-184(302)135(74-115-46-35-32-36-47-115)245-188(306)137(76-117-50-39-34-40-51-117)251-200(318)164(105(16)17)258-194(312)133(73-100(6)7)243-177(295)125(53-42-44-69-209)238-179(297)127(59-63-146(211)268)240-189(307)138(78-119-85-215-96-225-119)247-191(309)140(80-121-87-217-98-227-121)252-201(319)163(104(14)15)257-182(300)130(62-66-156(280)281)241-186(304)134(77-118-55-57-122(267)58-56-118)233-150(272)91-221-176(294)144(94-264)253-193(311)142(83-158(284)285)250-190(308)139(79-120-86-216-97-226-120)246-178(296)126(54-45-70-218-207(213)214)239-187(305)136(75-116-48-37-33-38-49-116)244-180(298)128(60-64-154(276)277)235-170(288)111(24)229-174(292)123(210)81-157(282)283/h32-40, 46-51, 55-58, 85-87, 96-114, 123-145, 160-169, 264-267H, 29-31, 41-45, 52-54, 59-84, 88-95, 208-210H2, 1-28H3, (H2, 211, 268)(H2, 212, 269)(H, 215, 225)(H, 216, 226)(H, 217, 227)(H, 219, 270)(H, 220, 293)(H, 221, 294)(H, 222, 315)(H, 223, 316)(H, 224, 317)(H, 228, 271)(H, 229, 292)(H, 230, 302)(H, 231, 322)(H, 232, 273)(H, 233, 272)(H, 234, 274)(H, 235, 288)(H, 236, 289)(H, 237, 310)(H, 238, 297)(H, 239, 305)(H, 240, 307)(H, 241, 304)(H, 242, 303)(H, 243, 295)(H, 244, 298)(H, 245, 306)(H, 246, 296)(H, 247, 309)(H, 248, 314)(H, 249, 299)(H, 250, 308)(H, 251, 318)(H, 252, 319)(H, 253, 311)(H, 254, 275)(H, 255, 301)(H, 256, 313)(H, 257, 300)(H, 258, 312)(H, 259, 320)(H, 260, 290)(H, 261, 323)(H, 262, 321)(H, 263, 291)(H, 276, 277)(H, 278, 279)(H, 280, 281)(H, 282, 283)(H, 284, 285)(H, 286, 287)(H, 324, 325)(H4, 213, 214, 218)/t107?, 108?, 109?, 110-, 111+, 112+, 113-, 114?, 123?, 124-, 125+, 126+, 127+, 128+, 129-, 130+, 131-, 132-, 133+, 134+, 135+, 136+, 137+, 138+, 139+, 140+, 141-, 142+, 143-, 144+, 145-, 160-, 161-, 162-, 163+, 164+, 165-, 166-, 167-, 168-, 169-/m1/s1

InChI Key YQWUMUHTZOOEROI-UIBFZGNWSA-N

Canonical SMILES CCC(C)C(C(=O)NC(C(C)CC)C(=O)NCC(=O)NC(CC(C)C)C(=O)NC(CCSC)C(=O)NC(C(C)C)C(=O)NCC(=O)NCC(=O)NC(C(C)C)C(=O)NC(C(C)C)C(=O)NC(C(C)CC)C(=O)NC(C)C(=O)NC(C(C)O)C(=O)O)NC(=O)C(C)NC(=O)CNC(=O)C(CCCCN)NC(=O)C(CC(=O)N)NC(=O)C(CO)NC(=O)CNC(=O)C(C(C)C)NC(=O)C(CC(=O)O)NC(=O)C(CCC(=O)O)NC(=O)C(C)NC(=O)C(CC1=CC=CC=C1)NC(=O)C(CC2=CC=CC=C2)NC(=O)C(C(C)C)NC(=O)C(CC(C)C)NC(=O)C(CCCCN)NC(=O)C(CCC(=O)N)NC(=O)C(CC3=CNC=N3)NC(=O)C(CC4=CNC=N4)NC(=O)C(C(C)C)NC(=O)C(CCC(=O)O)NC(=O)C(CC5=CC=C(C=C5)O)NC(=O)CNC(=O)C(CO)NC(=O)C(CC(=O)O)NC(=O)C(CC6=CNC=N6)NC(=O)



C(CCCNC(=N)N)NC(=O)C(CC7=CC=CC=C7)NC(=O)C(CCC(=O)O)NC(=O)C(C)NC(=O)C(CC(=O)O)N

Isomeric SMILES

CCC(C)[C@H](C(=O)N[C@H](C(C)CC)C(=O)NCC(=O)N[C@H](CC(C)C)C(=O)N[C@H](CCSC)C(=O)N[C@H](C(C)C)C(=O)NCC(=O)NCC(=O)N[C@H](C(C)C)C(=O)N[C@H](C(C)C)C(=O)N[C@H](C(C)CC)C(=O)N[C@H](C)C(=O)N[C@H](C(C)O)C(=O)O)NC(=O)[C@@H](C)NC(=O)CNC(=O)[C@@H](CCCCN)NC(=O)[C@@H](CC(=O)N)NC(=O)[C@@H](CO)NC(=O)CNC(=O)[C@@H](C(C)C)NC(=O)[C@@H](CC(=O)O)NC(=O)[C@@H](CCC(=O)O)NC(=O)[C@H](C)NC(=O)[C@H](CC1=CC=CC=C1)NC(=O)[C@H](CC2=CC=CC=C2)NC(=O)[C@H](C(C)C)NC(=O)[C@H](CC(C)C)NC(=O)[C@H](CCCCN)NC(=O)[C@H](CCC(=O)N)NC(=O)[C@H](CC3=CNC=N3)NC(=O)[C@H](CC4=CNC=N4)NC(=O)[C@H](C(C)C)NC(=O)[C@H](CCC(=O)O)NC(=O)[C@H](CC5=CC=C(C=C5)O)NC(=O)CNC(=O)[C@H](CO)NC(=O)[C@H](CC(=O)O)NC(=O)[C@H](CC6=CNC=N6)NC(=O)[C@H](CCCNC(=N)N)NC(=O)[C@H](CC7=CC=CC=C7)NC(=O)[C@H](CCC(=O)O)NC(=O)[C@H](C)NC(=O)C(CC(=O)O)N

Form	Lyophilized powder
Purity	>98%
Stability	The product is stable for three years when stored at the recommended temperature in lyophilized powder.
Applications	Amyloid b-peptide (1-43) (human) can be studied extensively to study various aspects of Alzheimer's disease pathology.
Storage	Store at -20°C, and keep desiccated.