Multiple System Atrophy (MSA)

Multiple System Atrophy (MSA) belongs to the family of amyloid-related diseases. MSA is defined by the misfolding and accumulation of amyloid alpha synuclein deposits in oligodendrocytes, to form Glial Cytoplasmic Inclusions (GCIs) leading to a rapidly progressive neurodegenerative disease.

MSA was originally defined by parkinsonian features with a poor response to Levodopa, (when generally PD patients show good Levodopa responses), in the early disease stages, and cerebellar ataxia in combination with autonomic dysfunctions such as orthostatic hypotension or autonomic urinary abnormalities. The discovery that alpha synuclein is the main constituent of LBs and GCIs led to a number of studies investigating the molecular mechanisms underlying the pathogenesis of PD and MSA.

StressMarq is proud to offer a range of proteins and antibodies for MSA research, including monomeric, oligomeric and fibrillar alpha synuclein constructs.

Proteins

Description	Species	Expression System	Catalog #
Pre-formed Fibrils			
Alpha Synuclein Pre-formed Fibrils (Type 1)	Human	E. coli	SPR-322
Alpha Synuclein Pre-formed Fibrils: ATTO 594 (Type 1)	Human	E. coli	SPR-322-A594
Alpha Synuclein Pre-formed Fibrils (Type 2)	Human	E. coli	SPR-317
Alpha Synuclein A53T Mutant Pre-formed Fibrils (Type 1)	Human	E. coli	SPR-326
Alpha Synuclein S87N Mutant Pre-formed Fibrils	Human	E. coli	SPR-500
Alpha Synuclein S129A Mutant Pre-formed Fibrils	Human	E. coli	SPR-506
Alpha Synuclein TNG (A53T, S87N, N103G) Pre-formed Fibrils	Human	E. coli	SPR-504
Alpha Synuclein E114C Mutant: ATTO 488 Pre-formed Fibrils	Human	E. coli	SPR-518-A488
Alpha Synuclein N-Terminal Acetylated Pre-formed Fibrils (Type 1)	Human	E. coli	SPR-332
Alpha Synuclein Pre-formed Fibrils: Biotinylated (C-Terminus)	Human	E. coli	SPR-508
Alpha Synuclein pSer129 Pre-formed Fibrils **New!**	Human	E. coli	SPR-521
Alpha Synuclein Pre-formed Fibrils (Type 1)	Mouse	E. coli	SPR-324
Alpha Synuclein Pre-formed Fibrils	Rat	E. coli	SPR-482
Alpha Synuclein Filaments (Immature Fibrils)	Human	E. coli	SPR-450
Alpha Synuclein and Tau Co-Polymer Fibrils			
Tau-352 (fetal 0N3R) and Alpha Synuclein Co-Polymer Fibrils	Human	E. coli	SPR-494
Tau-441 (2N4R) and Alpha Synuclein Co-Polymer Fibrils	Human	E. coli	SPR-495
Oligomers			
Alpha Synuclein Kinetically Stable Oligomers	Human	E. coli	SPR-484
Alpha Synuclein Dopamine-Stabilized Oligomers	Human	E. coli	SPR-466
Alpha Synuclein EGCG-Stabilized Oligomers	Human	E. coli	SPR-469
Monomers			
Alpha Synuclein Monomers (Type 1)	Human	E. coli	SPR-321
Alpha Synuclein Monomers (Type 1)	Mouse	E. coli	SPR-323
Alpha Synuclein Monomers (Type 2)	Human	E. coli	SPR-316
Alpha Synuclein A90C Mutant Monomers	Human	E. coli	SPR-478
Alpha Synuclein A53T Mutant Monomers (Type 1)	Human	E. coli	SPR-325
Alpha Synuclein S87N Mutant Monomers	Human	E. coli	SPR-499
Alpha Synuclein S129A Mutant Monomers	Human	E. coli	SPR-505
Alpha Synuclein TNG (A53T, S87N, N103G) Monomers	Human	E. coli	SPR-503
Alpha Synuclein E114C Mutant: ATTO 488 Monomers	Human	E. coli	SPR-517-A488
Alpha Synuclein N-Terminal Acetylated Monomers (Type 1)	Human	E. coli	SPR-331
Alpha Synuclein Monomers: Biotinylated (C-Terminus)	Human	E. coli	SPR-507
Alpha Synuclein pSer129 Monomers **New!**	Human	E. coli	SPR-520
Alpha Synuclein Monomers	Rat	E. coli	SPR-481

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Monoclonal Antibodies

Target	Clone	Host	Applications	Reactivity	Catalog #
Alpha Synuclein	3C11	Mouse	WB, ICC/IF	Hu, Ms, Rt	SMC-530
Alpha Synuclein	10H7	Mouse	WB, ICC/IF	Hu, Ms, Rt	SMC-531
Alpha Synuclein	3F8	Mouse	WB, ICC/IF, IHC	Hu, Ms, Rt	SMC-532
Alpha Synuclein	4F1	Mouse	WB, ICC/IF, IHC	Hu, Ms, Rt	SMC-533
Alpha Synuclein (pSer129)	J18	Rabbit	WB, IHC	Hu, Ms	SMC-600
Alpha Synuclein (Aggregate-Specific)	2F11	Mouse	WB, ICC/IF, IHC	Hu, Ms	SMC-617
Alpha Synuclein (N-terminal) **New!**	11D4	Mouse	WB, IHC	Hu, Ms, Rt	SMC-621
LRRK2/Dardarin Antibody	N231B/34	Mouse	WB, ICC/IF, IHC	Hu, Rt	SMC-445
LRRK2/Dardarin Antibody	N138/6	Mouse	WB, ICC/IF	Hu, Ms, Rt	SMC-446

Polyclonal Antibodies

Target	Clone	Host	Applications	Reactivity	Catalog #
Alpha Synuclein	PAb	Rabbit	WB, IHC	Hu, Ms, Rt	SPC-800
Alpha Synuclein (pSer129)	PAb	Rabbit	WB, ICC/IF, IHC	Hu, Ms, Rt	SPC-742
Bassoon/ZNF231 Antibody	PAb	Rabbit	WB, IHC	Hu, Ms, Rt	SPC-198

Small Molecules

Product	Description	Molecular Forumla	Catalog #
BML 259	CDK5, p25 kinase inhibitor	$C_{14}H_{16}N_2OS$	SIH-435