

UBIQUITINATION



CAPTURE THE DIVERSITY OF THE PROTEOME

Ubiquitin (Ub) is a 76 amino acid highly conserved eukaryotic polypeptide that selectively marks cellular proteins for proteolytic degradation by the 26S proteasome. The process of target selection, covalent attachment and shuttle to the 26S proteasome is a vital means of regulating the concentrations of key regulatory proteins (as well as misfolded or abnormal proteins) in the cell by limiting their lifespans. Polyubiquitination is a common feature of this modification. Post-translational tagging by Ub is involved in a multitude of cellular processes, including the cell cycle, cell growth and differentiation, embryogenesis, apoptosis, signal transduction, DNA repair, regulation of transcription and DNA replication, transmembrane transport, stress response, immune response, and nervous system functions. Serial steps for modification include the activation of Ub, an ATP-dependent formation of a thioester bond between Ub and the enzyme E1, transfer by transacylation of Ub from E1 to the Ub-conjugating enzyme E2, and covalent linkage to the target protein either directly from E2 or via E3 ligase enzyme. Deubiquitination enzymes also exist to reverse the marking of protein substrates. Increases or decreases in degradation of different substrates associated with mutation or inactivation of Ub, the E1-E2-E3 enzymes, or the substrates themselves have been correlated with a series of diseases that are the focus of modern drug discovery. A short representation of the long list of diverse diseases impacted by protein degradation pathways would include human papillomavirus, cytomegalovirus, the neurological pathology termed Angelman syndrome, melanoma, and colorectal cancers.

LIST OF ANTIBODY PRODUCTS

Catalog #	Product Title	Catalog #	Product Title	Catalog #	Product Title	Catalog #	Product Title
AP2162b	AMFR C-term Antibody	AP2174a	RAD23B N-term Antibody	AP2118b	UBE2L6 C-term Antibody	AP2133b	USP4 C-term Antibody
AP2162a	AMFR N-term Antibody	AP2104b	SMURF1 C-term Antibody	AP2118a	UBE2L6 N-term Antibody	AP2134b	USP5 C-term Antibody
AP2168b	BAP1 C-term Antibody	AP2104a	SMURF1 N-term Antibody	AP2169b	UBE2M Center Antibody	AP2134a	USP5 N-term Antibody
AP2168a	BAP1 N-term Antibody	AP2105b	SMURF2 C-term Antibody	AP2169a	UBE2M N-term Antibody	AP2135b	USP6 C-term Antibody
AP2116b	CDC34 C-term Antibody	AP2105a	SMURF2 N-term Antibody	AP2125a	UBE2N N-term Antibody	AP2135a	USP6 N-term Antibody
AP2116a	CDC34 N-term Antibody	AP2183b	SQSTM1 C-term Antibody	AP2156b	UBE2V C-term Antibody	AP2136b	USP7 C-term Antibody
AP2164b	CROC1A C-term Antibody	AP2180b	STAM C-term Antibody	AP2156a	UBE2V N-term Antibody	AP2136a	USP7 N-term Antibody
AP2164a	CROC1A N-term Antibody	AP2180a	STAM N-term Antibody	AP2157b	UBE2V1 C-term Antibody	AP2137b	USP8 C-term Antibody
AP2175b	Dsk2 C-term Antibody	AP2163c	TOLLIP Center Antibody	AP2157a	UBE2V1 N-term Antibody	AP2137a	USP8 N-term Antibody
AP2175a	Dsk2 N-term Antibody	AP2163b	TOLLIP C-term Antibody	AP2154b	UBE3A C-term Antibody	AP2165b	USP9 C-term Antibody
AP2120b	E2EPF C-term Antibody	AP2155b	TSG101 C-term Antibody	AP2154a	UBE3A N-term Antibody	AP2165a	USP9 N-term Antibody
AP2120a	E2EPF N-term Antibody	AP2155a	TSG101 N-term Antibody	AP2110b	UBE4A C-term Antibody	AP2138b	USP10 C-term Antibody
AP2101c	EDD Center Antibody	AP1065a	UBA2 N-term Antibody	AP2110a	UBE4A N-term Antibody	AP2138a	USP10 N-term Antibody
AP2101b	EDD C-term Antibody	AP1261a	UBC9 Antibody	AP2111b	UBE4B C-term Antibody	AP2139c	USP11 C-term Antibody
AP2159b	EPS15 C-term Antibody	AM1261a	UBC9 Antibody	AP2111a	UBE4B N-term Antibody	AP2140b	USP12 C-term Antibody
AP2159a	EPS15 N-term Antibody	AP2106b	UBCE7IP1 C-term Antibody	AP2176c	Ubiquilin1 Center Antibody	AP2140a	USP12 N-term Antibody
AP2160b	EPS15R C-term Antibody	AP2106a	UBCE7IP1 N-term Antibody	AP2176a	Ubiquilin1 N-term Antibody	AP2141c	USP13 Center Antibody
AP2160a	EPS15R N-term Antibody	AP2107b	UBCE7IP3 C-term Antibody	AP2177b	Ubiquilin3 C-term Antibody	AP2141a	USP13 N-term Antibody
AP2182b	Epsin2a C-term Antibody	AP2107a	UBCE7IP3 C-term Antibody	AP2177a	Ubiquilin3 N-term Antibody	AP2142b	USP14 C-term Antibody
AP2182a	Epsin2a N-term Antibody	AP2108b	UBCE7IP4 C-term Antibody	AP1229a	Ubiquitin C-term Antibody	AP2142a	USP14 N-term Antibody
AP2114c	HIP2 Center Antibody	AP2108a	UBCE7IP4 N-term Antibody	AP1228a	Ubiquitin N-term Antibody	AP2143b	USP15 C-term Antibody
AP2184a	HRD1 C-term Antibody	AP2109c	UBCE7IP5 Center Antibody	AP2129b	UBL4 C-term Antibody	AP2143a	USP15 N-term Antibody
AP2184b	HRD1 N-term Antibody	AP2109b	UBCE7IP5 C-term Antibody	AP2129a	UBL4 N-term Antibody	AP2144c	USP16 Center Antibody
AP2161a	IMOS-1 N-term Antibody	AP2100b	UbcH7-BP C-term Antibody	AP2178b	UBQLN3 C-term Antibody	AP2144a	USP16 N-term Antibody
AP2171b	ITCH C-term Antibody	AP2170b	UBCH9 C-term Antibody	AP2178a	UBQLN3 N-term Antibody	AP2145b	USP19 C-term Antibody
AP2171a	ITCH N-term Antibody	AP2170a	UBCH9 N-term Antibody	AP2126a	UCHL1 N-term Antibody	AP2145a	USP19 N-term Antibody
AP2172b	MIB C-term Antibody	AP2113c	UBE1 Center Antibody	AP2127b	UCHL3 C-term Antibody	AP2146b	USP20 C-term Antibody
AP2172a	MIB N-term Antibody	AP2113b	UBE1 C-term Antibody	AP2127a	UCHL3 N-term Antibody	AP2146a	USP20 N-term Antibody
AP2181b	MJD C-term Antibody	AP2115b	UBE2B C-term Antibody	AP2128b	UCHL5 C-term Antibody	AP2147b	USP21 N-term Antibody
AP2181a	MJD N-term Antibody	AP2115a	UBE2B N-term Antibody	AP2128a	UCHL5 N-term Antibody	AP2148a	USP22 N-term Antibody
AP2185b	NCE2 C-term Antibody	AP2119b	UBE2C C-term Antibody	AP2158a	UEV N-term Antibody	AP2149a	USP24 N-term Antibody
AP2185a	NCE2 N-term Antibody	AP2119a	UBE2C N-term Antibody	AP2130b	USP1 N-term Antibody	AP2150a	USP25 N-term Antibody
AP2102c	PJA Center Antibody	AP2121b	UBE2G1 C-term Antibody	AP2130a	USP1 N-term Antibody	AP2151a	USP26 N-term Antibody
AP2179c	PLIC1 Center Antibody	AP2121a	UBE2G1 N-term Antibody	AP2131b	USP2 C-term Antibody	AP2152a	USP28 N-term Antibody
AP2179a	PLIC1 N-term Antibody	AP2123b	UBE2G2 C-term Antibody	AP2131a	USP2 N-term Antibody	AP2153a	USP29 N-term Antibody
AP2103b	PSMD4 C-term Antibody	AP2123a	UBE2G2 N-term Antibody	AP2132b	USP3 C-term Antibody	AP2167b	VDU1-I C-term Antibody
AP2173b	RAD23A C-term Antibody	AP2122b	UBE2H C-term Antibody	AP2132c	USP3 C-term Antibody	AP2167a	VDU1-I N-term Antibody
AP2173a	RAD23A N-term Antibody	AP2117b	UBE2L3 C-term Antibody	AP2132a	USP3 N-term Antibody	AP2166b	VDU1-II C term Antibody
AP2174b	RAD23B C-term Antibody	AP2117a	UBE2L3 N-term Antibody	AP2133c	USP4 Center Antibody	AP2166a	VDU1-II N term Antibody

SELECTED PRODUCT INFORMATION

Name	Ubiquitin	Ubiquitin	DSK2	E2EPF	RAD23B	STAM	TSG101	UBC9	UBCE7IP1	UBCE7IP3
Epitope										
Catalog #	AP1228a	AP1229a	AP2175a	AP2120a	AP2174a	AP2180b	AP2155a	AP1261a	AP2106b	AP2107b
Western Blotting										
IHC										

• BC-Breast Carcinoma • HC-Hepatocarcinoma • IHC-Immunohistochemistry •



ABGENT develops innovative reagents and technologies to profile *post-translational modifications*, which dynamically regulate the functional proteome. These modifications forge a vital link between genotype and phenotype. By targeting these *post-translational modifications*, ABGENT serves scientists exploring the complex paths between cell signaling and pathology.

Corporate Headquarters
 6310 Nancy Ridge Dr., Ste 106
 San Diego, California 92121
 Tel: 1 858 622 0099
 Fax: 1 858 622 0609
 Email: info@abgent.com
 Email: sales@abgent.com

European Headquarters
 Centro Nord-Sud 2E
 6934 Bioggio-Lugano
 Switzerland
 Tel: +41 (0) 91 604 67 01
 Fax: +41 (0) 91 605 17 85
 Email: eurotech@abgent.com