# 20S Proteasome $\alpha$ 5 (m): 293 Lysate: sc-110731



The Power to Question

#### **BACKGROUND**

The proteasome represents a large protein complex that exists inside all eukaryotes and archaea, and in some bacteria. The main function of proteasomes is to degrade unnecessary or damaged proteins by proteolysis. The most common form of the proteasome, known as the 26S Proteasome, contains one 20S Proteasome core particle structure and two 19S regulatory caps. The 20S Proteasome core is hollow and forms an enclosed cavity, where proteins are degraded, as well as openings at the two ends to allow the target protein to enter. The 20S Proteasome core particle contains many subunits, depending on the organism. All of the subunits fall into one of two types:  $\alpha$  subunits, which are structural, serve as docking domains for the regulatory particles and exterior gates blocking unregulated access to the interior cavity; or  $\beta$  subunits, which are predominantly catalytic. The outer two rings in the proteasome consist of seven  $\alpha$  subunits each, and the inner two rings each consist of seven  $\beta$  subunits.

# **REFERENCES**

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# **STORAGE**

Store at -20° C. Repeated freezing and thawing should be minimized. Sample vial should be boiled once prior to use. Non-hazardous. No MSDS required.

#### **CHROMOSOMAL LOCATION**

Genetic locus: Psma5 (mouse) mapping to 3 F3.

### **PRODUCT**

20S Proteasome  $\alpha$ 5 (m): 293 Lysate represents a lysate of mouse 20S Proteasome  $\alpha$ 5 transfected 293 cells and is provided as 100 µg protein in 200 µl SDS-PAGE buffer.

# **APPLICATIONS**

20S Proteasome  $\alpha$ 5 (m): 293 Lysate is suitable as a Western Blotting positive control for mouse reactive 20S Proteasome  $\alpha$ 5 antibodies. Recommended use: 10-20  $\mu$ l per lane.

Control 293 Lysate: sc-110760 is available as a Western Blotting negative control lysate derived from non-transected 293 cells.

# **RESEARCH USE**

For research use only, not for use in diagnostic procedures.

# **PROTOCOLS**

See our web site at www.scbt.com for detailed protocols and support products.

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