

Anti-ATP-dependent zinc metalloprotease FTSH 1/5, chloroplastic antibody

Catalog: PHY3710S

Product Information

Description: Rabbit polyclonal antibody

Background: FtsH is an essential ATP-dependent metalloprotease for protein quality control

in the thylakoid membrane of *Arabidopsis thaliana* chloroplasts. It is required for chloroplast development during leaf growth, and particularly for the specific degradation of photo-damaged D1 protein in the photosystem II (PSII) complex to maintain photosynthesis activity. In the *Arabidopsis thaliana* genome, 12

genes encoding members of the FtsH family have been identified. Nine of these proteins (FtsH1, 2, 5, 6, 7, 8, 9, 11, and 12) are located in the chloroplast. FtsH1

and FtsH5 are interchangeable in thylakoid membranes.

Synonyms: FTSH1/5

Immunogen: KLH-conjugated synthetic peptide (16 aa from N terminal section) derived from

Arabidopsis thaliana FTSH1/5 (AT1G50250) and FTSH5 (AT5G42270).

Form: Lyophilized

Quantity:150 μgPurification:Serum

Peptide affinity form antibody available upon request at info@phytoab.com.

Reconstitution: Reconstitution with 150 µl of sterile water.

"Note: please spin tube briefly prior to opening it to avoid any losses that might

occur from lyophilized material adhering to the cap or sides of the tube".

Stability &Use a manual defrost freezer and avoid repeated freeze-thaw cycles.

Storage: 12 months from date of receipt, -20 to -70 ℃ as supplied.

6 months, -20 to -70°C under sterile conditions after reconstitution.

1 month, 2 to 8°C under sterile conditions after reconstitution.

Shipping: The product is shipped at 4° . Upon receipt, store it immediately at the

temperature recommended above.

Application Information

Recommended Dilution: Western Blot (1:1000-1:2000)

Note: Optimal dilutions/concentrations should be determined by the



end user.

Expected / apparent MW: 75 kDa

Confirmed Reactivity: Coming soon

Predicted Reactivity: Among species analyzed, the sequence of the synthetic peptide used

for immunization is 100% homologues with the sequence in Sorghum

bicolor, Chlamydomonas reinhardtii, Physcomitrium patens,

Nicotiana tabacum, Cucumis sativus, Panicum virgatum, Solanum lycopersicum, Solanum tuberosum, Spinacia oleracea, Vitis vinifera, Medicago truncatula, Populus trichocarpa, Brassica napus, Brassica rapa, Gossypium raimondii, Sorghum bicolor, Zea mays, Triticum aestivum, Hordeum vulgare, Oryza sativa, and 80-99% homologues

with the sequence in Glycine max.

For more species homologues information, please contact tech

support at tech@phytoab.com.