

Anti-Lhca3 protein of LHCI antibody

Catalog: PHY2976S

Product Information

Description:	Rabbit polyclonal antibody	
Background:	The light-harvesting complex (LHC) functions as a light receptor, it captures	
Dackground.		
	and delivers excitation energy to photosystem with which it is closely	
	associated. The light-harvesting protein Lhca3 is one of the four main and	
	highly conserved types of chlorophyll a/b-binding proteins (Lhca1-4) of the light	
	harvesting antenna (LHCI) of plant photosystem I. Lhca3 is imported as a	
	precursor from the cytosol into the chloroplast. Upon integration in the thylakoid	
	membrane Lhca3 forms a heterodimer (LHCI-680) with Lhca2 that associates	
	with the PSI core close to PsaF and PsaK.	
Synonyms:	LHCA3, PHOTOSYSTEM I LIGHT HARVESTING COMPLEX GENE 3	
Immunogen:	KLH-conjugated synthetic peptide (16 aa from Central section) derived from	
	Arabidopsis thaliana LHCA3 (AT1G61520).	
Form:	Lyophilized	
Quantity:	150 µg	
Purification:	Serum	
	Peptide affinity form antibody available upon request at <u>info@phytoab.com</u> .	
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 $^\circ C$ as supplied.	
	6 months, -20 to -70 $^\circ\!\!\!\!\!^\circ$ under sterile conditions after reconstitution.	
	1 month, 2 to 8 $^\circ\!\mathrm{C}$ under sterile conditions after reconstitution.	
Shipping:	The product is shipped at 4 $^\circ\!\mathrm{C}$. 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: Predicted Reactivity:

29 kDa

Among species analyzed, the sequence of the synthetic peptide used for immunization is 100% homologues with the sequence in *Sorghum bicolor*, *Brassica rapa*, *Medicago truncatula*, *Spinacia oleracea*, *Brassica napus*, *Triticum aestivum*, *Hordeum vulgare*, *Panicum virgatum*, *Zea mays*, *Setaria viridis*, and 80-99% homologues with the sequence in *Oryza sativa*, *Populus trichocarpa*, *Vitis vinifera*, *Glycine max*, *Gossypium raimondii*, *Solanum tuberosum*, *Nicotiana tabacum*, *Cucumis sativus*, *Solanum lycopersicum*, *Physcomitrium patens*. For more species homologues information, please contact tech support at <u>tech@phytoab.com</u>.

Application Example



Recom: 2.5 ng, 10 ng and 25 ng recombinant protein containing the peptide for immunization and having a molecular mass of 54 kDa.
Electrophoresis: 12% SDS-PAGE
Transfer: blotting to NC (nitrocellulose) membrane for 1 h.
Blocking: 5% skim milk at RT or 4°C for 1 h.
Primary antibody: 1:1000 dilution overnight at 4°C.
Secondary antibody: 1:10000 dilution using Goat Anti-Rabbit IgG H&L (HRP) (Cat# PHY6000).
Detection: using chemiluminescence substrate and image were captured with

CCD camera.

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