

product **AS08 330**

PetC | Rieske iron-sulfur protein of Cyt b6/f complex

product information

background	Rieske Iron-Sulfur Protein (Q9ZR03) is located in chloroplast thylakoid membrane as a component of cytochrome b6-f complex, which mediates electron transfer between photosystem II (PSII) and photosystem I (PSI), cyclic electron flow around PSI, and state transitions. Alternative names: Rieske iron-sulfur protein, RISP, ISP, plastoquinone:plastocyanin oxidoreductase iron-sulfur protein, proton gradient regulation protein 1
immunogen	KLH-conjugated synthetic peptide which shows strong conservation across higher plants including <i>Arabidopsis thaliana</i> Q9ZR03 , <i>Chlamydomonas reinhardtii</i> P49728 and <i>Synechococcus</i> sp. Q5N5B0
antibody format	rabbit; polyclonal; serum; lyophilized
quantity	200 µl - for reconstitution add 200 µl of sterile water
storage	store lyophilized/reconstituted at -20°C; once reconstituted make aliquots to avoid repeated freeze-thaw cycles. Please, remember to spin tubes briefly prior to opening them to avoid any losses that might occur from lyophilized material adhering to the cap or sides of the tubes.
tested applications	Western blot (WB)
additional information	to be added when available

application information

recommended dilution	1: 10 000 with ECL Advance detection system
expected apparent MW	23 kDa
confirmed reactivity	<i>Arabidopsis thaliana</i> , <i>Euglena</i> sp., <i>Synechococcus</i> PCC 7942, <i>Thalassiosira guillardii</i>
predicted reactivity	dicots including: <i>Nicotiana tabacum</i> , <i>Pisum sativum</i> , <i>Spinacia oleracea</i> , monocots including: <i>Hordeum vulgare</i> , <i>Oryza sativa</i> , <i>Zea mays</i> , trees: <i>Populus trichocarpa</i> , moss: <i>Physcomitrella patens</i> , algae: <i>Chlamydomonas reinhardtii</i> , cyanobacteria
not reactive in	no confirmed exceptions from predicted reactivity known in the moment
additional information	to be added when available
selected references	to be added when available

application example

5 µg of total protein from (1) *Arabidopsis thaliana* leaf extracted with Protein Extraction Buffer, PEB (**AS08 300**), (2) *Euglena sp.* extracted with PEB, (3) *Synechococcus elongatus* whole cell extracted with PEB, were separated on **4-12% NuPage** (Invitrogen) **LDS-PAGE** and blotted 1h to **PVDF**. Blots were blocked immediately following transfer in 2% ECL Advance blocking reagent (GE Healthcare) in 20 mM Tris, 137 mM sodium chloride pH 7.6 with 0.1% (v/v) Tween-20 (TBS-T) for 1h at room temperature with agitation. Blots were incubated in the primary antibody at a dilution of 1: 10 000 for 1h at room temperature with agitation. The antibody solution was decanted and the blot was rinsed briefly twice, then washed once for 15 min and 3 times for 5 min in TBS-T at room temperature with agitation. Blots were incubated in secondary antibody (anti-rabbit IgG horse radish peroxidase conjugated, from Abcam) diluted to 1:50 000 in 2% ECL Advance blocking solution for 1h at room temperature with agitation. The blots were washed as above and developed for 5 min with ECL Advance detection reagent according the manufacturers instructions. Images of the blots were obtained using a CCD imager (FluorSMax, Bio-Rad) and Quantity One software (Bio-Rad).

