

# Anti-Plant alternative oxidase 1, C-terminal antibody

Catalog: PHY2213A

## Product Information

<b>Description:</b>	Rabbit polyclonal antibody
<b>Background:</b>	Alternative oxidases (AOX) are quinol oxidases located in the inner mitochondrial membrane of plants. They function as terminal oxidases in the alternate electron transport pathway, oxidizing ubiquinone to reduce oxygen to water. AOX isoenzymes are including AOX1A (AT3G22370), AOX1B (AT3G22360), AOX1C (AT3G27620) and AOX1D (AT1G32350) from <i>Arabidopsis</i> .
<b>Synonyms:</b>	AOX1A/B
<b>Immunogen:</b>	KLH-conjugated synthetic peptide (16 aa from C terminal section) derived from <i>Arabidopsis thaliana</i> AOX1A (AT3G22370) and AOX1B (AT3G22360)
<b>Form:</b>	Lyophilized
<b>Quantity:</b>	150 µg
<b>Purification:</b>	Immunogen affinity purified
<b>Reconstitution:</b>	Reconstitution with 150 µl of 0.01 M sterile PBS. "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".
<b>Stability &amp; Storage:</b>	Use a manual defrost freezer and avoid repeated freeze-thaw cycles. 12 months from date of receipt, -20 to -70°C as supplied. 6 months, -20 to -70°C under sterile conditions after reconstitution. 1 month, 2 to 8°C under sterile conditions after reconstitution.
<b>Shipping:</b>	The product is shipped at 4°C. Upon receipt, store it immediately at the temperature recommended above.

## Application Information

<b>Recommended Dilution:</b>	Western Blot (1:1000-1:2000) Note: Optimal dilutions/concentrations should be determined by the end user.
<b>Expected / apparent MW:</b>	40 (AT3G22370), 37 (AT3G22360) / 33 kDa
<b>Confirmed Reactivity:</b>	<i>Arabidopsis thaliana</i>

Research Use Only

### Predicted Reactivity:

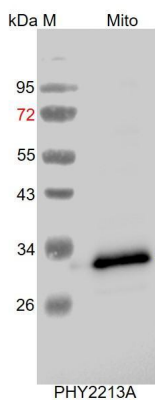
Among species analyzed, the sequence of the synthetic peptide used for immunization is 100% homologues with the sequence in *Brassica napus*, *Brassica rapa*, *Populus trichocarpa*, and 80-99% homologues with the sequence in *Gossypium raimondii*, *Medicago truncatula*, *Glycine max*, *Oryza sativa*, *Spinacia oleracea*.

The sequence of the synthetic peptide used for immunization is 94% (15/16) homologues with the sequence in AOX1C (AT3G27620).

For more species homologues information, please contact tech support at [tech@phytoab.com](mailto:tech@phytoab.com).

## Application Example

### Example1:



Mito: 15 µg mitochondria protein from *Arabidopsis thaliana*.

**Electrophoresis:** 15% SDS-PAGE

**Transfer:** blotting to NC (nitrocellulose) membrane for 1 h.

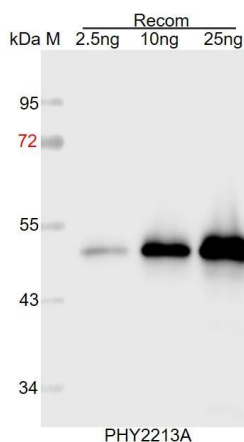
**Blocking:** 5% skim milk at RT or 4°C for 1 h.

**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.

### Example2:



Recom: 2.5 ng, 10 ng and 25 ng recombinant protein containing the peptide for immunization and having a molecular mass of 50 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.