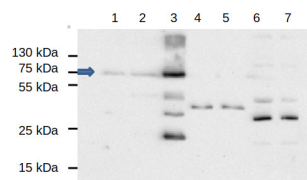


Product no **AS13 2751****Anti-EDS1 | Enhanced disease susceptibility 1****Product information**

<b>Immunogen</b>	KLH-conjugated synthetic peptide derived from <i>Arabidopsis thaliana</i> EDS1 sequence, UniProt: <a href="#">Q9SU72</a> , TAIR: <a href="#">AT3G48090</a>
<b>Host</b>	Rabbit
<b>Clonality</b>	Polyclonal
<b>Purity</b>	Immunogen affinity purified serum in PBS pH 7.4.
<b>Format</b>	Lyophilized
<b>Quantity</b>	50 µg
<b>Reconstitution</b>	For reconstitution add 50 µl of sterile water
<b>Storage</b>	Store lyophilized/reconstituted at -20°C; once reconstituted make aliquots to avoid repeated freeze-thaw cycles. Please remember to spin the tubes briefly prior to opening them to avoid any losses that might occur from material adhering to the cap or sides of the tube.
<b>Additional information</b>	This product can be sold containing ProClin if requested

**Application information**

<b>Recommended dilution</b>	1 : 1000 (WB)
<b>Expected   apparent MW</b>	71.6 kDa   72 kDa
<b>Confirmed reactivity</b>	<i>Arabidopsis thaliana</i>
<b>Predicted reactivity</b>	<i>Arabidopsis thaliana</i>
<b>Not reactive in</b>	<i>Nicotiana benthamiana</i> , <i>Solanum lycopersicum</i>
<b>Selected references</b>	<p>Qi et al. (2024). Ubiquitination and degradation of plant helper NLR by the <i>Ralstonia solanacearum</i> effector RipV2 overcome tomato bacterial wilt resistance. <i>Cell Rep.</i> 2024 Aug 6;43(8):114596. doi: 10.1016/j.celrep.2024.114596.</p> <p>Schütte et al. (2024). Cold priming on pathogen susceptibility in the <i>Arabidopsis eds1</i> mutant background requires a functional stromal Ascorbate Peroxidase. <i>Plant Signal Behav.</i> 2024 Dec 31;19(1):2300239.</p> <p>Li et al. (2022) Plasma membrane-nucleo-cytoplasmic coordination of a receptor-like cytoplasmic kinase promotes EDS1-dependent plant immunity. <i>Nat Plants.</i> 2022 Jul;8(7):802-816. doi: 10.1038/s41477-022-01195-x. Epub 2022 Jul 18. PMID: 35851623.</p> <p>Chang et al. (2019). PBS3 Protects EDS1 from Proteasome-Mediated Degradation in Plant Immunity. <i>Mol Plant.</i> 2019 Feb 11. pii: S1674-2052(19)30055-3. doi: 10.1016/j.molp.2019.01.023.</p> <p>Chakraborty et al. (2018). Epigenetic and transcriptional control of chickpea WRKY40 promoter activity under <i>Fusarium</i> stress and its heterologous expression in <i>Arabidopsis</i> leads to enhanced resistance against bacterial pathogen. <i>Plant Science</i>, doi.org/10.1016/j.plantsci.2018.07.014</p>

**Samples:**

- 1 -40 µg of *Arabidopsis thaliana* whole leaf extract, non treated
  - 2 -40 µg of *Arabidopsis thaliana* whole leaf extract, treated with PstAvrB 3h
  - 3- 40 µg of *Arabidopsis thaliana* whole leaf extract, old-6 weeks
  - 4-40 µg of *Solanum lycopersicum* (negative control) 8 discs extract, control leaf
  - 5-40 µg of *Solanum lycopersicum* (negative control) 8 discs extract, wounded leaf
  - 6-40 µg of *Arabidopsis thaliana* whole leaf extract, mutant *eds1*
  - 7-40 µg of *Arabidopsis thaliana* whole leaf extract, mutant *eds1*
- Mark: MW markers: 5µL Thermo scientific pageruler plus prestained ladder

40 µg/well of total protein was extracted freshly from *Arabidopsis thaliana* and *Solanum lycopersicum* (see above) with a buffer: Tris-HCl pH 7,5 50mM; 10% glycerol; 1mM EDTA; 200mM NaCl; 1mM DTT; 0,1% Triton X-100; Sigma protease cocktail; sigma phosphatase inhibitor cocktail; 140 mM pepstatine A and 0,1mM PMSF in MiliQ water (samples 1-5) and Tris-HCl 50mM pH 7.8; 0.2% triton x-100; Sigma protease inhibitor

cocktail; 1% PMSF and 1.5% pepstatin A in MiliQ water; (samples 6-7) and denatured with SDS buffer (Tris-HCl pH 6,8, 8% SDS, 40% glycerol) and 1ul DTT 0,5 M at 95°C for 5 min. Proteins were separated on 12 % SDS-PAGE and blotted 1h to PVDF (pore size of 0,45 µm), using semi-dry. Blot was blocked with 3 % non-fat milk for 1h/RT with agitation. Blot was incubated in the primary antibody at a dilution of 1: 1 000 with agitation in 3% milk-TBS-T 0,1 %T ON/4°C. The antibody solution was decanted and the blot then washed three times for 10 min 3% milk-TBS-0,1%T at RT with agitation. Blot was incubated in Agrisera matching secondary antibody (anti-rabbit IgG horse radish peroxidase conjugated [AS09 602](#)) diluted to 1:10 000 in 3% milk-TBS-0,1%T for 1h/RT with agitation. The blot was washed three times with TBS and developed for 4 min (300uL + 300 uL / membrane) with either [Agrisera ECLSuperBright](#). Exposure time was 1800 seconds in total. The image correspond to 1660-second exposure.

Courtesy of Dr. María C. Romero-Puertas, Department of Biochemistry, Cell and Molecular Biology of Plants, CSIC, Spain