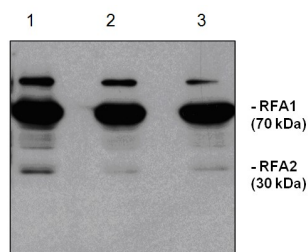


Product no **AS07 214****Anti-RFA | Baker's yeast replication factor A****Product information**

| | |
|-----------------------|---|
| Immunogen | RPA from <i>Saccharomyces cerevisiae</i> consisting of three subunits RFA1 (70 kDa), RFA2 (30 kDa) and RFA3 (14 kDa); overexpressed in <i>E.coli</i> and purified by chromatography; no affinity tags were added to any of three subunits |
| Host | Rabbit |
| Clonality | Polyclonal |
| Purity | Serum |
| Format | Lyophilized |
| Quantity | 50 µl |
| Reconstitution | For reconstitution add 50 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 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. |

Application information

| | |
|-------------------------------|---|
| Recommended dilution | ChIP, 1 : 20 000 (WB) |
| Expected apparent MW | 70 + 30 + 14 kDa |
| Confirmed reactivity | <i>Saccharomyces cerevisiae</i> |
| Predicted reactivity | <i>Saccharomyces cerevisiae</i> |
| Not reactive in | No confirmed exceptions from predicted reactivity are currently known |
| Additional information | <p>Antibody was also successfully used in ChIP application Holstein et al. (2014).</p> <p>Load of 1 ng of the protein will allow to visualize two subunits of RPA, while load of 5 ng will allow to visualize all three subunits in Western blot technique.</p> |
| Selected references | <p>Masnovov et al. (2024). Stabilization of expandable DNA repeats by the replication factor Mcm10 promotes cell viability. <i>Nat Commun</i> . 2024 Dec 3;15(1):10532. doi: 10.1038/s41467-024-54977-6.</p> <p>Galanti et al. (2024). Dbf4-dependent kinase promotes cell cycle controlled resection of DNA double-strand breaks and repair by homologous recombination. <i>Nat Commun</i>. 2024 Apr 3;15(1):2890. doi: 10.1038/s41467-024-46951-z.</p> <p>Kotenko and Makovets (2024). The functional significance of the RPA- and PCNA-dependent recruitment of Pif1 to DNA. <i>EMBO Rep</i>. 2024 Mar 13. doi: 10.1038/s44319-024-00114-9.</p> <p>Joo et al. (2024). RPA interacts with Rad52 to promote meiotic crossover and noncrossover recombination. <i>Nucleic Acids Res</i>. 2024 Feb 10;gkae083.doi: 10.1093/nar/gkae083.</p> <p>Shi et al. (2023). A R-loop sensing pathway mediates the relocation of transcribed genes to nuclear pore complexes. <i>STAR Protoc</i>. 2023 Sep 20;4(4):102577.doi: 10.1016/j.xpro.2023.102577.</p> <p>Scherzer et al (2022). Recruitment of Scc2/4 to double-strand breaks depends on ?H2A and DNA end resection. <i>Life Sci Alliance</i>. 2022 Jan 27;5(5):e202101244. doi: 10.26508/lsa.202101244. PMID: 35086935; PMCID: PMC8807874.</p> <p>Minchell et al. (2020). Cohesin Causes Replicative DNA Damage by Trapping DNA Topological Stress. <i>Mol Cell</i> . 2020 Mar 29;S1097-2765(20)30161-1. doi: 10.1016/j.molcel.2020.03.013.</p> <p>He et. al (2019). KEOPS complex promotes homologous recombination via DNA resection. <i>Nucleic Acids Res</i>. 2019 Apr 2. pii: gkz228. doi: 10.1093/nar/gkz228.</p> <p>Jakobsen et al. (2019). Minimal Resection Takes Place during Break-Induced Replication Repair of Collapsed Replication Forks and Is Controlled by Strand Invasion. <i>Cell Rep</i>. 2019 Jan 22;26(4):836-844.e3. doi: 10.1016/j.celrep.2018.12.108. (used AS07 214-100, which is a larger size unit of AS07 214)</p> <p>Deshpande et al. (2017). Structural Basis of Mec1-Ddc2-RPA Assembly and Activation on Single-Stranded DNA at Sites of Damage. <i>Mol Cell</i>. 2017 Oct 19;68(2):431-445.e5. doi: 10.1016/j.molcel.2017.09.019.</p> |



TCA precipitated protein extracts from a wild type yeast strain (*S. cerevisiae*) were separated on 10% gel and transferred to a PVDF membrane. Antibody was used in different dilutions: 1: 5000 (1); 1: 10 000 (2); 1: 20 000 (3);

Besides the bands for RFA1 and RFA2 an unspecific band was detected at ~150 kDa.