

Certificate of Analysis
Product: Affinity Purified Anti-FANCF (Rabbit)

Code: 600-401-674

Lot # 18045cr

Size: 100 µg

Physical State: Liquid (sterile filtered)

Antibody Concentration: 1.19 mg/ml (by UV absorbance at 280 nm)

Buffer: 0.02 M Potassium Phosphate, 0.15 M Sodium Chloride, pH 7.2

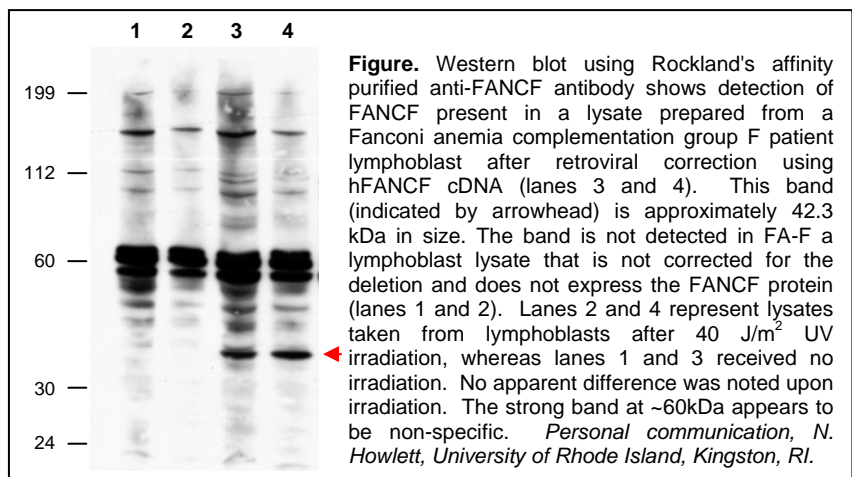
Stabilizer: None

Preservative: 0.01% (w/v) Sodium Azide

Storage Conditions: Store vial at -20° C prior to opening. Dilute only prior to immediate use. For extended storage, aliquot contents and freeze at -20° C or below. Avoid cycles of freezing and thawing. Expiration date is one (1) year from date of opening.

Background Information: FANCF (also called Protein FACF or Fanconi Anemia Group F protein) is involved in DNA repair, perhaps specifically with post-replication repair or a cell cycle checkpoint function. FANCF has also been implicated in interstrand DNA cross-link repair and in the maintenance of normal chromosome stability. FANCF belongs to the multi-subunit Fanconi Anemia (FA) complex composed of FANCA, FANCB, FANCC, FANCE, FANCF, FANCG, FANCL/PHF9 and FANCM. The complex is not found in FA patients. FANCF is found within the nucleus. Defects in FANCF are a cause of

Fanconi anemia (FA). FA is a genetically heterogeneous, autosomal recessive disorder characterized by progressive pancytopenia, a diverse assortment of congenital malformations, and a predisposition to the development of malignancies. At the cellular level, it is associated with hypersensitivity to DNA-damaging agents, chromosomal instability (increased chromosome breakage), and defective DNA repair.


Recommended Dilutions:

ELISA	1:15,000 - 1:60,000
WESTERN BLOT	1:1,000 - 1:5,000
IF MICROSCOPY	User Optimized
OTHER APPLICATION	User Optimized

Application Note(s): This affinity purified antibody has been tested for use in ELISA and by western blot. Specific conditions for reactivity should be optimized by the end user. Expect a band approximately 42 kDa in size corresponding to FANCF by western blotting in the appropriate human tissue.

Relevant Links:

 NCBI [NP_073562](https://pubmed.ncbi.nlm.nih.gov/12345678/) or [Q9NPI8](https://pubmed.ncbi.nlm.nih.gov/12345679/)

 Swiss-Prot [Q52LM0](https://www.uniprot.org/uniprot/Q52LM0)

Purity and Specificity: This affinity purified antibody is directed against human FANCF protein. The product was affinity purified from monospecific antiserum by immunoaffinity chromatography. A BLAST analysis was used to suggest cross-reactivity with FANCF protein from human and chimpanzee based on 100% homology with the immunizing sequence. Reactivity against homologues from other sources is not known.

Immunogen: This affinity purified antibody was prepared from whole rabbit serum produced by repeated immunizations with a synthetic peptide corresponding to an internal amino acid sequence of human FANCF.

Target Protein: Human FANCF, 374 aa, predicted MW 42.3 kDa

General References:

Leveille,F., Blom,E., Medhurst,A.L., Bier,P., Laghmani el,H., Johnson,M., Rooimans,M.A., Sobeck,A., Waisfisz,Q., Arwert,F., Patel,K.J., Hoatlin,M.E., Joenje,H. and de Winter,J.P. (2004) The Fanconi anemia gene product FANCF is a flexible adaptor protein. *J. Biol. Chem.* **279** (38), 39421-39430.

Narayan,G., Arias-Pulido,H., Nandula,S.V., Basso,K., Sugirtharaj,D.D., Vargas,H., Mansukhani,M., Villella,J., Meyer,L., Schneider,A., Gissmann,L., Durst,M., Pothuri,B. and Murty,V.V. (2004) Promoter hypermethylation of FANCF: disruption of Fanconi Anemia-BRCA pathway in cervical cancer. *Cancer Res.* **64** (9), 2994-2997.

Marsit,C.J., Liu,M., Nelson,H.H., Posner,M., Suzuki,M. and Kelsey,K.T. (2004) Inactivation of the Fanconi anemia/BRCA pathway in lung and oral cancers: implications for treatment and survival. *Oncogene* **23** (4), 1000-1004.

Medhurst,A.L., Huber,P.A., Waisfisz,Q., de Winter,J.P. and Mathew,C.G. (2001) Direct interactions of the five known Fanconi anaemia proteins suggest a common functional pathway. *Hum. Mol. Genet.* **10** (4), 423-429.

de Winter,J.P., van der Weel,L., de Groot,J., Stone,S., Waisfisz,Q., Arwert,F., Scheper,R.J., Kruyt,F.A., Hoatlin,M.E. and Joenje,H. (2000) The Fanconi anemia protein FANCF forms a nuclear complex with FANCA, FANCC and FANCG. *Hum. Mol. Genet.* **9** (18), 2665-2674.

Related Products:

#600-401-670	Affinity Purified Anti-Human FANCA [Rabbit]
#600-401-671	Affinity Purified Anti-Human FANCG [Rabbit]
#600-401-672	Affinity Purified Anti-Human FANCC [Rabbit]
#600-401-673	Affinity Purified Anti-Human FANCE [Rabbit]
#600-401-674	Affinity Purified Anti-Human FANCF [Rabbit]
#611-703-127	Peroxidase Conjugated Affinity Purified Anti-RABBIT IgG (H&L) (DONKEY) MX10
#611-132-122	IRDye® 800 Conjugated Affinity Purified Anti-RABBIT IgG (H&L) (GOAT) MX10
#611-144-122	DyLight™680 Conjugated Affinity Purified Anti-RABBIT IgG (H&L) (GOAT) MX10
#B501-0500	BLOTTO (500 g)
#BSA-30	30% BOVINE SERUM ALBUMIN SOL'N in 0.85% sodium chloride (no preservative or stabilizer) (500 ml)
#B304	NORMAL GOAT SERUM (NGS) (10 ml)
#KIA-003	MaxTag™ Anti-RABBIT IgG Kit for Immunoblotting
#MB-070	Blocking Buffer for Fluorescent Western Blotting

Note: This product is for research use only and is not intended for therapeutic or diagnostic applications. Please contact a technical service representative for more information. All products of animal origin manufactured by Rockland Immunochemicals are derived from starting materials of North American origin. Collection was performed in United States Department of Agriculture (USDA) inspected facilities and all materials have been inspected and certified to be free of disease and suitable for exportation. All properties listed are typical characteristics and are not specifications. All suggestions and data are offered in good faith but without guarantee as conditions and methods of use of our products are beyond our control. All claims must be made within 30 days following the date of delivery. The prospective user must determine the suitability of our materials before adopting them on a commercial scale. Suggested uses of our products are not recommendations to use our products in violation of any patent or as a license under any patent of Rockland Immunochemicals, Inc. If you require a commercial license to use this material and do not have one, then return this material, unopened to: Rockland Inc., P.O. BOX 326, Gilbertsville, Pennsylvania, USA.