AbFlex[®] AHR antibody (rAb)



Catalog Nos: 91461, 91462 Application(s): ChIP-Seq, IF, IP, WB Reactivity: Human Quantities: 100 µg, 10 µg Purification: Affinity Purified Host: Rabbit Isotype: IgG Molecular Weight: 96 kDa

Background: AbFlex® antibodies are recombinant antibodies (rAbs) that have been generated using defined DNA sequences to produce highly specific, reproducible antibodies. Each AbFlex antibody contains a 6xHis Tag, a Biotinylation Tag for enzymatic biotin conjugation using the biotin ligase, BirA, and a sortase recognition motif (LPXTG) to attach a variety of labels directly to the antibody including fluorophores, enzymatic substrates (HRP, AP), peptides, drugs as well as solid supports.

AbFlex® AHR antibody was expressed as full-length IgG with rabbit immunoglobulin heavy and light chains in mammalian HEK293 cells.

AHR (aryl hydrocarbon receptor, also known as FVH3; RP85; bHLHe76) is a ligand-activated helix-loop-helix transcription factor involved in the regulation of biological responses to planar aromatic hydrocarbons.

Immunogen: This AHR antibody was raised against a peptide of human AHR.

Buffer: Purified IgG in 140 mM Hepes, pH 7.5, 70 mM NaCl, 32 mM NaOAc, 40% glycerol and 0.035% sodium azide. Sodium azide is highly toxic.

Application Notes:

Applications Validated by Active Motif: WB: 0.5 - 2 μg/ml *IP: 2 μg/ml per IP IF: 2 μg per ml ChIP-Seq: 2 μg per ChIP-Seq

*For optimal results, primary antibody incubations should be performed at room temperature. The addition of 0.1% Tween 20 to all blocking solutions may also reduce background. Individual optimization may be required.

Storage and Guarantee: Some products may be shipped at room temperature. This will not affect their stability or performance. Avoid repeated freeze/thaw cycles by aliquoting items into single-use fractions for storage at -20°C for up to 2 years. Keep all reagents on ice when not in storage. This product is guaranteed for 12 months from date of receipt.

This product is for research use only and is not for use in diagnostic procedures.

Application Key: ChIP = Chromatin Immunoprecipitation; FACS = Flow Cytometry; IF = Immunofluorescence; IHC = Immunohistochemistry; IP = Immunoprecipitation; WB = Western Blot





AbFlex® AHR antibody (rAb) tested by ChIP-Seq.

ChIP was performed using the ChIP-IT[®] High Sensitivity Kit (Cat. No. 53040) with 25 μ g of chromatin from A375 cells, treated with 10 μ M indirubin for 30 minutes, and 2 μ g of antibody. ChIP DNA was sequenced on the Illumina NovaSeq and 37 million sequence tags were mapped to identify AHR binding sites. The image shows binding across a region of chromosome 2.

AbFlex[®] AHR rAb antibody tested by immunofluorescence.

Staining of 10 μ M indirubin treated A375 cells detected with AHR antibody for 30 minutes at 2 μ g/mL. Followed by Multi-rAb CoraLite® Plus 594-Goat Anti-Rabbit Recombinant Secondary Antibody (H+L). DAPI at 594 nm.



$= \frac{180}{135} \\ - 100 \\ - 75 \\ - 65 \\ - 45$	AbFlex[®] AHR rAb antibody tested by immunoprecipitation. 2 μg of antibody was used to immunoprecipitated AHR from 1 mg of A375 whole cell extract, 40% IP product (Lane 2) was ran on SDS-PAGE and probed with the same antibody at 0.5 μg /ml. Tween-20 at 0.1% was added to blocking buffers to perform Western blot and reduce background. 2 μg of rabbit IgG was used as negative control for IP (Lane 1).
$ \begin{array}{c} $	AbFlex[®] AHR rAb antibody tested by Western blot. Detection of AHR by Western blot analysis using 40 μg of whole cell lysates from A375 (Lane 1) and HepG2 (Lane 2) and probed with antibody at 0.5 μg/ml.