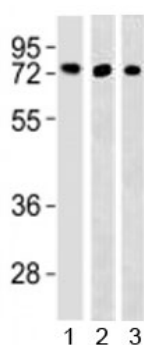


## TFE3 Antibody / Transcription factor E3 (F46400)

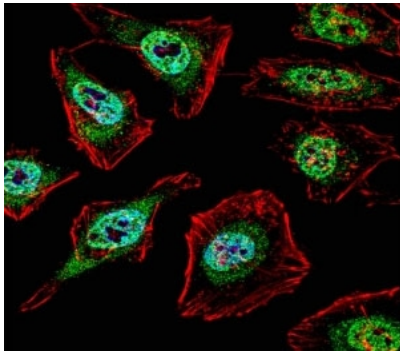
Catalog No.	Formulation	Size
F46400-0.4ML	In 1X PBS, pH 7.4, with 0.09% sodium azide	0.4 ml
F46400-0.08ML	In 1X PBS, pH 7.4, with 0.09% sodium azide	0.08 ml

[Bulk quote request](#)

<b>Availability</b>	1-3 business days
<b>Species Reactivity</b>	Human, Mouse
<b>Format</b>	Antigen affinity purified
<b>Clonality</b>	Polyclonal (rabbit origin)
<b>Isotype</b>	Rabbit Ig
<b>Purity</b>	Antigen affinity
<b>UniProt</b>	P19532
<b>Applications</b>	Western blot : 1:1000 Immunofluorescence : 1:10-1:50
<b>Limitations</b>	This TFE3 antibody is available for research use only.



Western blot testing of TFE3 antibody and 1) HepG2, 293 and 3) mouse lung lysate.  
Predicted molecular weight ~60kDa.



Fluorescent confocal image of HeLa cell stained with TFE3 antibody. Alexa Fluor 488 conjugated secondary (green) was used. TFE3 immunoreactivity is localized to the nucleus and cytoplasm.

## Description

The microphthalmia transcription factor/transcription factor E (MITF-TFE) family of basic helix-loop-helix leucine zipper (bHLH-Zip) transcription factors includes four family members: MITF, TFE3, TFEB and TFEC. The TEF3 protein encoded by this gene activates transcription through binding to the muE3 motif of the immunoglobulin heavy-chain enhancer. The TFEC protein forms heterodimers with the TEF3 protein and inhibits TFE3-dependent transcription activation. The TEF3 protein interacts with transcription regulators such as E2F3, SMAD3, and LEF-1, and is involved in TGF-beta-induced transcription, playing important roles in cell growth, proliferation, and osteoclast and macrophage differentiation. The TFE3 protein also activates hepatic IRS-2 gene, and induces hexokinase II (HK2) and insulin-induced gene 1 (INSIG1); it participates in insulin signaling and could be a therapeutic target for diabetes. This gene is also involved in chromosomal translocations, resulting in different fusion gene products in papillary renal cell carcinomas and alveolar soft part sarcomas, such as PRCC-TFE3, RCC17-TFE3, PSF-TFE3, NonO (p54nrb)-TFE3 and ASPL-TFE3.

## Application Notes

Titration of the TFE3 antibody may be required due to differences in protocols and secondary/substrate sensitivity.

## Immunogen

A portion of amino acids 1-30 from the human protein was used as the immunogen for this TFE3 antibody.

## Storage

Aliquot the TFE3 antibody and store frozen at -20oC or colder. Avoid repeated freeze-thaw cycles.