Datasheet for ABIN2486428
anti-SCNN1A antibody (AA 629-650) (FITC)

Overview

Quantity: 100 μg
Target: SCNN1A
Binding Specificity: AA 629-650
Reactivity: Rat
Host: Rabbit
Clonality: Polyclonal
Conjugate: This SCNN1A antibody is conjugated to FITC
Application: Western Blotting (WB), Immunohistochemistry (IHC), Immunofluorescence (IF), Immunocytochemistry (ICC)

Product Details

Immunogen: Produced against the C-terminal tail (amino acids 629-650) of rat gamma ENaC (antibody designation L550)
Specificity: Detects ~83 kDa.
Cross-Reactivity: Hamster, Human, Mouse, Rat, Xenopus laevis
Purification: Protein A Purified

Target Details

Target: SCNN1A
Alternative Name: ENaC (SCNN1A Products)
Target Details

**Background:**
The Epithelial Sodium Channel (ENaC) is a membrane ion channel permeable to Na+ ions. It is located in the apical plasma membrane of epithelia in the kidneys, lung, colon, and other tissues where it plays a role in trans epithelial Na+ ion transport (1). Specifically Na+ transport via ENaC occurs across many epithelial surfaces, and plays a key role in regulating salt and water absorption (2). ENaCs are composed of three structurally related subunits that form a tetrameric channel, α, β, and γ. The expression of its alpha and beta subunits is enhanced as keratinocytes differentiate (3, 4). The beta and gamma-ENaC subunits are essential for edema fluid to exert its maximal effect on net fluid absorption by distal lung epithelia(5). And it has been concluded that the subunits are differentially expressed in the retina of mice with ocular hypertension, therefore the up-regulation of alpha-ENaC proteins could serve as a protection mechanism against elevated intraocular pressure (6).

<table>
<thead>
<tr>
<th>Gene ID:</th>
<th>24768</th>
</tr>
</thead>
<tbody>
<tr>
<td>NCBI Accession:</td>
<td>NP_058742</td>
</tr>
<tr>
<td>UniProt:</td>
<td>P37091</td>
</tr>
</tbody>
</table>

**Application Details**

| Application Notes: | • WB (1:1000)  
• IHC (1:100)  
• optimal dilutions for assays should be determined by the user. |
<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Comment:</td>
<td>1 μg/ml of ABIN2486428 was sufficient for detection of gamma-ENaC in 20 μg of rat kidney tissue lysate by colorimetric immunoblot analysis using Goat anti-rabbit IgG:HRP as the secondary antibody.</td>
</tr>
<tr>
<td>Restrictions:</td>
<td>For Research Use only</td>
</tr>
</tbody>
</table>

**Handling**

<table>
<thead>
<tr>
<th>Format:</th>
<th>Liquid</th>
</tr>
</thead>
<tbody>
<tr>
<td>Concentration:</td>
<td>1 mg/mL</td>
</tr>
<tr>
<td>Buffer:</td>
<td>PBS, 50 % glycerol, 0.09 % sodium azide, Storage buffer may change when conjugated</td>
</tr>
<tr>
<td>Preservative:</td>
<td>Sodium azide</td>
</tr>
<tr>
<td>Precaution of Use:</td>
<td>This product contains Sodium azide: a POISONOUS AND HAZARDOUS SUBSTANCE which should be handled by trained staff only.</td>
</tr>
</tbody>
</table>
Handling

Storage: 4 °C

Storage Comment: Conjugated antibodies should be stored at 4°C

Images

**Immunohistochemistry**


**Western Blotting**

**Image 2.** Western blot analysis of Rat kidney tissue lysates showing detection of ENaC protein using Rabbit Anti-ENaC Polyclonal Antibody. Primary Antibody: Rabbit Anti-ENaC Polyclonal Antibody at 1:1000.

**Western Blotting**

**Image 3.** Western blot analysis of Mouse kidney cortex showing detection of ENaC protein using Rabbit Anti-ENaC Polyclonal Antibody. Primary Antibody: Rabbit Anti-ENaC Polyclonal Antibody at 1:1000. Low-salt diet (lanes 1-4) compared to a high-salt diet (lanes 5-7). 70kDa degradation band observed in low-salt.