

## 4-Hydroxynonenal Antibody

### 4-Hydroxynonenal Antibody, Clone 12F7

Catalog # ASM10339

## Specification

### 4-Hydroxynonenal Antibody - Product Information

Application **ICC/IF, WB**  
Host **Mouse**  
Isotype **IgG1**  
Clonality **Monoclonal**  
Format **APC**

### Description

Mouse Anti-4-Hydroxynonenal (4-HNE)  
Monoclonal IgG1

### Target/Specificity

Specific for 4-Hydroxynonenal (4-HNE) modified proteins. Does not detect free 4-Hydroxynonenal. Does not cross-react with 4-Hydroxy-2-hexenal, Acrolein, Crotonaldehyde, Hexanoyl Lysine, Malondialdehyde, or Methylglyoxal modified proteins.

### Other Names

4-Hydroxynonenal Antibody, 4-Hydroxy Nonenal (4-HNE) Antibody, 4-Hydroxy Nonenal Antibody, 4-HNE Antibody, 4-hydroxy Hexenal Antibody, HNE Antibody, 4-hydroxy-2-nonenal Antibody

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### Immunogen

Synthetic 4-Hydroxynonenal modified Keyhole Limpet Hemocyanin (KLH).

### Purification

Protein G Purified

Storage **-20°C**

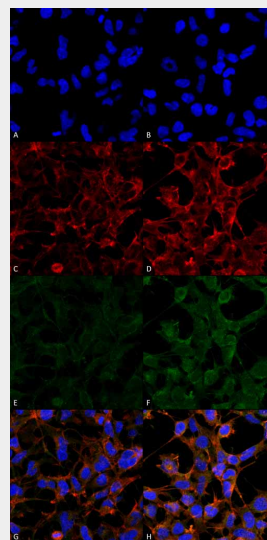
### Storage Buffer

PBS pH 7.4, 50% glycerol, 0.9% Sodium Azide

Shipping **Blue Ice or 4°C**  
Temperature

### Certificate of Analysis

A 1:1000 dilution of SMC-511 was sufficient for detection of 4-Hydroxynonenal in 0.5 µg of 4-Hydroxynonenal conjugated to BSA by



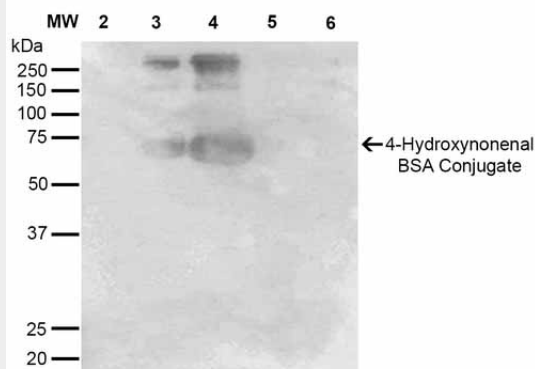
Immunocytochemistry/Immunofluorescence analysis using Mouse Anti-4-Hydroxynonenal Monoclonal Antibody, Clone 12F7 (ASM10339). Tissue: Embryonic kidney cells (HEK293). Species: Human. Fixation: 5% Formaldehyde for 5 min. Primary Antibody: Mouse Anti-4-Hydroxynonenal Monoclonal Antibody (ASM10339) at 1:50 for 30-60 min at RT. Secondary Antibody: Goat Anti-Mouse Alexa Fluor 488 at 1:1500 for 30-60 min at RT. Counterstain: Phalloidin Alexa Fluor 633 F-Actin stain; DAPI (blue) nuclear stain at 1:250, 1:50000 for 30-60 min at RT. Magnification: 20X (2X Zoom). (A,C,E,G) - Untreated. (B,D,F,H) - Cells cultured overnight with 50 µM H<sub>2</sub>O<sub>2</sub>. (A,B) DAPI (blue) nuclear stain. (C,D) Phalloidin Alex Fluor 633 F-Actin stain. (E,F) 4-Hydroxynonenal Antibody. (G,H) Composite. Courtesy of: Dr. Robert Burke, University of Victoria.

ECL immunoblot analysis using Goat Anti-Mouse IgG:HRP as the secondary Antibody.

#### 4-Hydroxynonenal Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)



Western Blot analysis of 4-hydroxy-nonenal-BSA Conjugate showing detection of 67 kDa 4-hydroxy-nonenal-BSA using Mouse Anti-4-hydroxy-nonenal Monoclonal Antibody, Clone 12F7 (ASM10339). Lane 1: Molecular Weight Ladder (MW). Lane 2: BSA (0.5  $\mu$ g). Lane 3: 4-hydroxyl nonenal-BSA (0.5  $\mu$ g). Lane 4: 4-hydroxy nonenal-BSA (2.0  $\mu$ g). Lane 5: 4-hydroxy-2-hexenal (0.5  $\mu$ g). Lane 6: 4-hydroxy-2-hexenal (2.0  $\mu$ g). Block: 5% Skim Milk in TBST. Primary Antibody: Mouse Anti-4-hydroxy-nonenal Monoclonal Antibody (ASM10339) at 1:1000 for 2 hours at RT. Secondary Antibody: Goat Anti-Mouse IgG: HRP at 1:2000 for 60 min at RT. Color Development: ECL solution for 5 min in RT. Predicted/Observed Size: 67 kDa.