

# [KO Validated] Lamin A/C Rabbit mAb

Catalog No.: A19524   **KO Validated**   **Recombinant**   **20 Publications**

## Basic Information

### Observed MW

68kDa/72kDa

### Calculated MW

74kDa

### Category

Primary antibody

### Applications

WB,IHC-P,IF/ICC,IP,ELISA

### Cross-Reactivity

Human, Mouse, Rat

### Clone/No number

ARC5001-08

## Background

The protein encoded by this gene is part of the nuclear lamina, a two-dimensional matrix of proteins located next to the inner nuclear membrane. The lamin family of proteins make up the matrix and are highly conserved in evolution. During mitosis, the lamina matrix is reversibly disassembled as the lamin proteins are phosphorylated. Lamin proteins are thought to be involved in nuclear stability, chromatin structure and gene expression. Vertebrate lamins consist of two types, A and B. Alternative splicing results in multiple transcript variants. Mutations in this gene lead to several diseases: Emery-Dreifuss muscular dystrophy, familial partial lipodystrophy, limb girdle muscular dystrophy, dilated cardiomyopathy, Charcot-Marie-Tooth disease, and Hutchinson-Gilford progeria syndrome.

## Recommended Dilutions

WB	1:50000 - 1:300000
IHC-P	1:1000 - 1:4000
IF/ICC	1:100 - 1:800
IP	0.5μg-4μg antibody for 200μg-400μg extracts of whole cells
ELISA	Recommended starting concentration is 1 μg/mL. Please optimize the concentration based on your specific assay requirements.

## Immunogen Information

### Gene ID

4000

### Swiss Prot

P02545

### Immunogen

Recombinant protein (or fragment). This information is considered to be commercially sensitive.

### Synonyms

FPL; IDC; LFP; CDDC; EMD2; FPLD; HGPS; LDP1; LMN1; LMNC; MADA; PRO1; CDCD1; CMD1A; FPLD2; LMNL1; CMT2B1; LGMD1B; /C

## Product Information

Source	Isotype	Purification
Rabbit	IgG	Affinity purification

### Storage

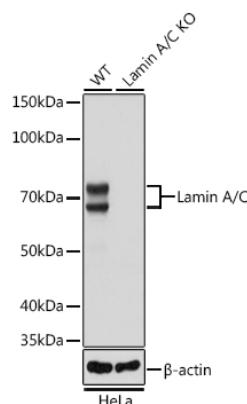
Store at -20°C. Avoid freeze / thaw cycles.

Buffer: PBS containing 50% glycerol and 0.05% BSA, preserved with proclin300 or sodium azide (as specified on the Certificate of Analysis), pH 7.3.

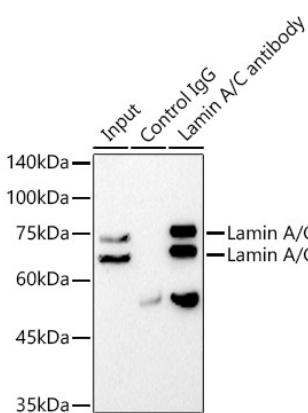
## Contact

	400-999-6126
	<a href="mailto:cn.market@abclonal.com.cn">cn.market@abclonal.com.cn</a>
	<a href="http://www.abclonal.com.cn">www.abclonal.com.cn</a>

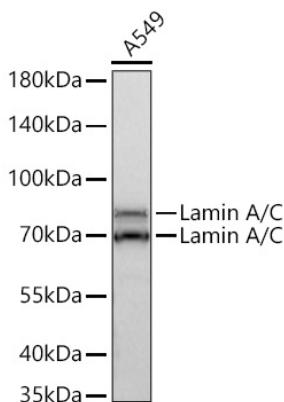
## Validation Data



Western blot analysis of lysates from wild type (WT) and Lamin A/C knockout (KO) HeLa cells using [KO Validated] Lamin A/C Rabbit mAb (A19524) at 1:50000 dilution incubated overnight at 4°C. Secondary antibody: HRP-conjugated Goat anti-Rabbit IgG (H+L) (AS014) at 1:10000 dilution. Lysates/proteins: 25µg per lane. Blocking buffer: 3% nonfat dry milk in TBST. Detection: ECL Basic Kit (RM00020). Exposure time: 1s.

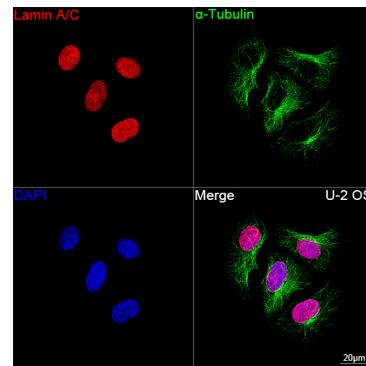
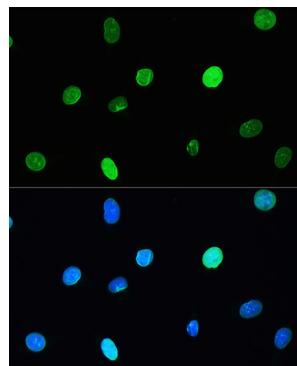
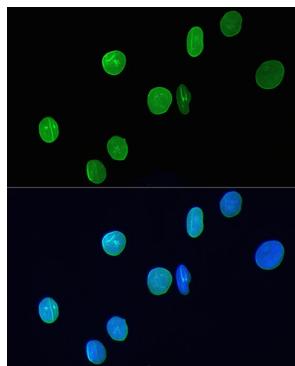
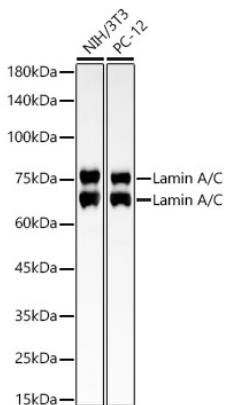


Immunoprecipitation analysis of 300 µg extracts from PC-12 cells using 3 µg [KO Validated] Lamin A/C Rabbit mAb (A19524). Western blot was performed from the immunoprecipitate using [KO Validated] Lamin A/C Rabbit mAb (A19524) at a dilution of 1:100000.



Western blot analysis of lysates from A549 cells using [KO Validated] Lamin A/C Rabbit mAb (A19524) at 1:240000 dilution incubated overnight at 4°C. Secondary antibody: HRP-conjugated Goat anti-Rabbit IgG (H+L) (AS014) at 1:10000 dilution. Lysates/proteins: 25µg per lane. Blocking buffer: 3% nonfat dry milk in TBST. Detection: ECL Basic Kit (RM00020). Exposure time: 30s.

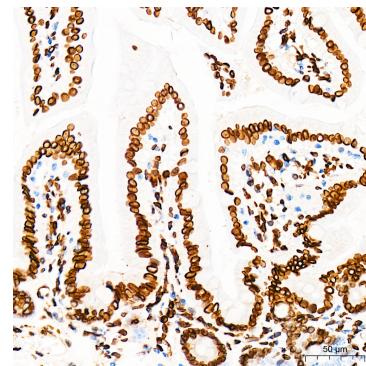
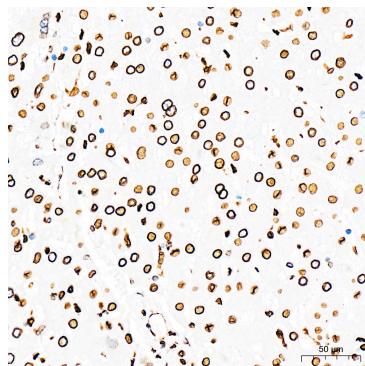
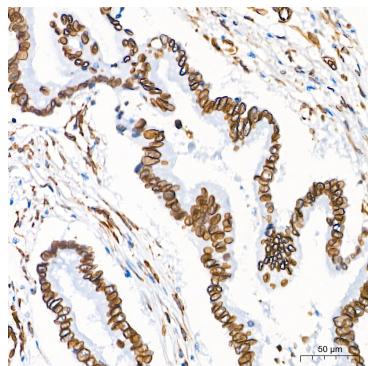
## Validation Data



Immunofluorescence analysis of H9C2 cells using [KO Validated] Lamin A/C Rabbit mAb (A19524) at dilution of 1:200. Blue: DAPI for nuclear staining.

Immunofluorescence analysis of L929 cells using [KO Validated] Lamin A/C Rabbit mAb (A19524) at dilution of 1:200. Blue: DAPI for nuclear staining.

Confocal imaging of U-2 OS cells using [KO Validated] Lamin A/C Rabbit mAb (A19524, dilution 1:200) followed by a further incubation with Cy3 Goat Anti-Rabbit IgG (H+L) (AS007, dilution 1:500) (Red). The cells were counterstained with  $\alpha$ -Tubulin Mouse mAb (AC012, dilution 1:400) followed by incubation with Abflo® 488-conjugated Goat Anti-Mouse IgG (H+L) Ab (AS076, dilution 1:500) (Green). DAPI was used for nuclear staining (Blue). Objective: 100x.

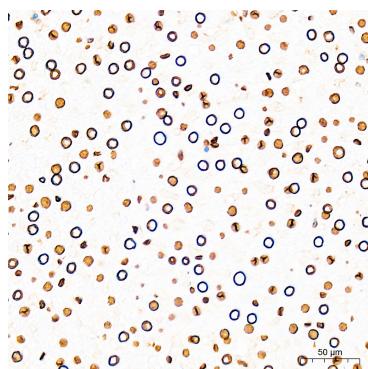


Immunohistochemistry analysis of paraffin-embedded Human colon carcinoma tissue using [KO Validated] Lamin A/C Rabbit mAb (A19524) at a dilution of 1:1300 (40x lens). High pressure antigen retrieval performed with 0.01M Citrate Buffer (pH 6.0) prior to IHC staining.

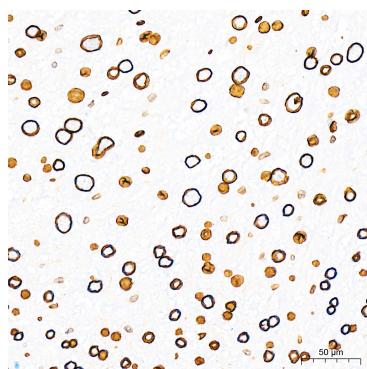
Immunohistochemistry analysis of paraffin-embedded Human liver tissue using [KO Validated] Lamin A/C Rabbit mAb (A19524) at a dilution of 1:1300 (40x lens). High pressure antigen retrieval performed with 0.01M Citrate Buffer (pH 6.0) prior to IHC staining.

Immunohistochemistry analysis of paraffin-embedded Mouse intestine tissue using [KO Validated] Lamin A/C Rabbit mAb (A19524) at a dilution of 1:1300 (40x lens). High pressure antigen retrieval performed with 0.01M Citrate Buffer (pH 6.0) prior to IHC staining.

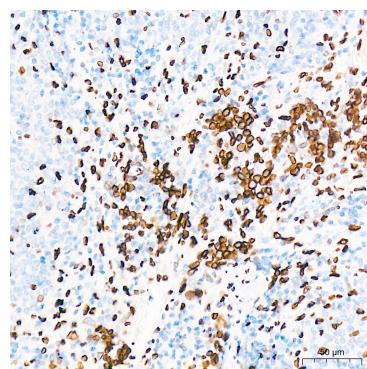
## Validation Data



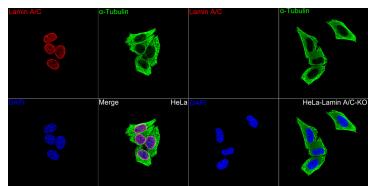
Immunohistochemistry analysis of paraffin-embedded Mouse liver tissue using [KO Validated] Lamin A/C Rabbit mAb (A19524) at a dilution of 1:1300 (40x lens). High pressure antigen retrieval performed with 0.01M Citrate Buffer (pH 6.0) prior to IHC staining.



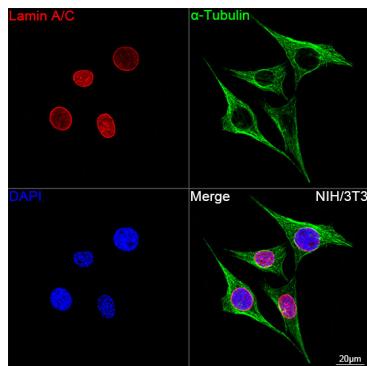
Immunohistochemistry analysis of paraffin-embedded Rat liver tissue using [KO Validated] Lamin A/C Rabbit mAb (A19524) at a dilution of 1:1300 (40x lens). High pressure antigen retrieval performed with 0.01M Citrate Buffer (pH 6.0) prior to IHC staining.



Immunohistochemistry analysis of paraffin-embedded Rat spleen tissue using [KO Validated] Lamin A/C Rabbit mAb (A19524) at a dilution of 1:1300 (40x lens). High pressure antigen retrieval performed with 0.01M Citrate Buffer (pH 6.0) prior to IHC staining.



Confocal imaging of HeLa cells and Lamin A/C knockout(KO) HeLa cells using [KO Validated] Lamin A/C Rabbit mAb (A19524, dilution 1:200) followed by a further incubation with Cy3-conjugated Goat anti-Rabbit IgG (H+L) (AS007, dilution 1:500) (Red). The cells were counterstained with  $\alpha$ -Tubulin Mouse mAb (AC012, dilution 1:400) followed by incubation with ABflo® 488-conjugated Goat Anti-Mouse IgG (H+L) Ab (AS076, dilution 1:500) (Green). DAPI was used for nuclear staining (Blue). Objective: 100x.



Confocal imaging of NIH/3T3 using [KO Validated] Lamin A/C Rabbit mAb (A19524, dilution 1:200) followed by a further incubation with Cy3-conjugated Goat anti-Rabbit IgG (H+L) (AS007, dilution 1:500) (Red). The cells were counterstained with  $\alpha$ -Tubulin Mouse mAb (AC012, dilution 1:400) followed by incubation with ABflo® 488-conjugated Goat Anti-Mouse IgG (H+L) Ab (AS076, dilution 1:500) (Green). DAPI was used for nuclear staining (Blue). Objective: 100x.