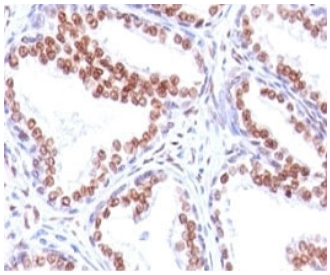
Androgen Receptor Antibody Clone SPM335 / AR Antibody [clone SPM335] (V2639)

Catalog No.	Formulation	Size
V2639-100UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	100 ug
V2639-20UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	20 ug
V2639SAF-100UG	1 mg/ml in 1X PBS; BSA free, sodium azide free	100 ug
V2639IHC-7ML	Prediluted in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide; *For IHC use only*	7 ml

Bulk quote request

Availability	1-3 business days
Species Reactivity	Human
Format	Purified
Host	Mouse
Clonality	Monoclonal (mouse origin)
Isotype	Mouse IgG1, kappa
Clone Name	SPM335
Purity	Protein G affinity chromatography
UniProt	P10275
Localization	Nuclear
Applications	Immunohistochemistry (FFPE) : 1-2ug/ml for 30 min at RT
Limitations	This Androgen Receptor antibody is available for research use only.



Androgen Receptor Antibody Clone SPM335 immunohistochemistry of human prostate carcinoma. Formalin-fixed, paraffin-embedded human prostate carcinoma tissue stained with Androgen Receptor Antibody Clone SPM335 shows strong nuclear HRP-DAB brown chromogenic staining in tumor epithelial cells, consistent with androgen receptor expression and the expected nuclear localization of this ligand-activated steroid hormone receptor. Surrounding stromal cells demonstrate minimal staining, highlighting the epithelial predominance of AR-positive tumor cells within the carcinoma tissue.

Description

Androgen receptor (AR), encoded by the AR gene and also known as nuclear receptor subfamily 3 group C member 4 (NR3C4), is a ligand-activated transcription factor that mediates cellular responses to androgens including testosterone and dihydrotestosterone. This steroid hormone receptor plays a central role in male reproductive development, prostate function, and androgen-dependent gene regulation. Androgen Receptor Antibody Clone SPM335 recognizes the AR protein and is used to study androgen receptor expression and localization in research settings.

Clone SPM335 is a mouse monoclonal antibody developed to detect androgen receptor protein in cells and tissues. Because AR functions as a nuclear transcription factor, detection using Androgen Receptor Antibody Clone SPM335 typically reveals nuclear localization within androgen-responsive epithelial cells. This nuclear staining pattern reflects the transcriptional activity of AR after ligand binding and receptor activation, when the receptor translocates to the nucleus and regulates androgen-responsive genes.

Androgen receptor expression is well documented in multiple androgen-sensitive tissues, particularly within prostate glandular epithelium where AR signaling regulates epithelial differentiation and secretory function. Nuclear AR expression can also be observed in additional tissues influenced by androgen signaling, including certain epithelial and stromal cell populations. Detection of AR protein is therefore widely used to investigate androgen-dependent cellular pathways and hormone-responsive tissue biology.

In oncology research, androgen receptor expression is frequently evaluated in prostate cancer and other tumor types where androgen signaling contributes to tumor biology. AR signaling remains a critical regulatory pathway in many prostate tumors, and measurement of AR protein expression can help characterize androgen-responsive tumor cells. Antibodies such as Androgen Receptor Antibody Clone SPM335 support studies examining AR signaling, tumor cell differentiation, and the molecular pathways influenced by androgen receptor activity.

In addition to prostate biology, androgen receptor signaling has been investigated in other tissues where steroid hormone regulation influences cellular function. The AR protein contains functional domains including an N-terminal transactivation domain, DNA-binding domain, and ligand-binding domain, which together enable ligand-dependent transcriptional regulation. Antibodies directed against AR allow researchers to examine receptor expression patterns and cellular localization in a variety of biological contexts.

Androgen Receptor Antibody Clone SPM335 is a mouse monoclonal antibody designed to recognize AR protein in research applications. Detection of androgen receptor using this antibody supports studies focused on androgen signaling mechanisms, nuclear receptor biology, prostate tissue differentiation, and hormone-regulated gene expression.

Application Notes

Optimal dilution of the Androgen Receptor Antibody Clone SPM335 should be determined by the researcher.

1. Staining of formalin-fixed tissues requires boiling tissue sections in 10mM Tris with 1mM EDTA, pH 9.0, for 10-20 min followed by cooling at RT for 20 min
2. The prediluted format is supplied in a dropper bottle and is optimized for use in IHC. After epitope retrieval step (if required), drip mAb solution onto the tissue section and incubate at RT for 30 min.

Immunogen

Amino acids 302-318 (STEDTAEYSPFKGGYTK) from human AR were used as the immunogen for the anti-Androgen Receptor antibody.

Storage

Store the anti-Androgen Receptor antibody at 2-8oC (with azide) or aliquot and store at -20oC or colder (without azide).

Alternate Names

AR antibody, NR3C4 antibody, Nuclear receptor subfamily 3 group C member 4 antibody, Androgen receptor nuclear receptor antibody