

## Anti-ssDNA/dsDNA [m3D8] Standard Size Ab00347-1.4

This antibody was created using our proprietary Fc Silent™ engineered Fc domain containing key point mutations that abrogate binding to Fc gamma receptors.

**Isotype and Format:** Mouse IgG1, Fc Silent™, Kappa

**Clone Number:** m3D8

**Alternative Name(s) of Target:** single-/double-strand DNA; desoxyribonucleic acid; dsDNA; ssDNA

**UniProt Accession Number of Target Protein:**

**Published Application(s):** hydrololysis, SPR, ELISA

**Published Species Reactivity:** Species independent

**Immunogen:** 3'-biotin oligodeoxynucleotide ss(dN)40 with

N=CCATGAGTGATAACACTGCGGCCAACTTACTTCTGACAAC

**Specificity:** Binds unspecifically to double- and single-stranded DNA oligomers.

**Application Notes:** This catalytic antibody binds to DNA oligomers both single- and double-stranded, irrespective of the sequence, showing DNA-hydrolytic activity. DNA is the principle storage of genetic information and usually sequestered within the nucleus in Eukaryotes. Extracellular DNA is a key danger signal for the immune system and an antigen to disease-causing auto-antibodies (incl. DNA-hydrolysing antibodies) e.g. in Systemic Lupus Erythematosus. Antibody formats comprising different numbers of variable domains may be useful tools in investigating the significance of these catalytic antibodies in disease.

**Antibody First Published in:** Kim et al. 2006 Heavy and light chain variable single domains of an anti-DNA binding antibody hydrolyze both double- and single-stranded DNAs without sequence specificity.

Journal of Biological Chemistry 2006; 281(22):15287-1595 [PMID:16551636](#)

**Note on publication:** Describes binding studies on mAB 3D8 on different types of oligos (ssDNA, dsDNA, dT:dA, dN:dN etc) using ELISA and SPR.

## Product Form

**Size:** 200 µg Purified antibody.

**Purification:** Protein A affinity purified

**Supplied In:** PBS with 0.02% Proclin 300.

**Storage Recommendation:** Store at 4°C for up to 3 months. For longer storage, aliquot and store at -20°C.

**Concentration:**

1 mg/ml.

Important note – This product is for research use only. It is not intended for use in therapeutic or diagnostic procedures for humans or animals.