

## Serratia marcescens nuclease (SMnuclease), Recombinant

Cat. No. EXWM-3708

Lot. No. (See product label)

### Introduction

**Description** SMnuclease is the only known nuclease that can hydrolyze all types of nucleic acids, including single-stranded, double-stranded, linear, and circular DNA or RNA. The DNA hydrolysis rate of SMnuclease is 34 times that of DNaseI, and 4 times that of Staphylococcus aureus nuclease. SMnuclease can react under a very wide range of conditions (such as 6 M Urea, 0.1 M Guanidine HCl, 0.4% Triton X-100, 0.1% SDS, 1 mM EDTA, 1 mM PMSF) and is widely used to remove nucleic acids from biological products.

### Product Information

<b>Species</b>	Serratia marcescens
<b>Form</b>	Colorless clear liquid
<b>EC Number</b>	EC 3.1.30.2
<b>CAS No.</b>	9025-65-4
<b>Molecular Weight</b>	28.0 kDa
<b>Purity</b>	>90% by SDS-PAGE
<b>Activity</b>	$\geq 1.5 \times 10^6$ U/mg
<b>pH Stability</b>	pH 6-10
<b>Optimum pH</b>	8
<b>Optimum temperature</b>	37°C
<b>Unit Definition</b>	The amount of enzyme that reduced the value of $\Delta A_{260}$ by 1.0 (equivalent to the complete digestion of 37 $\mu$ g Salmon DNA) within 30 minutes under the reaction conditions of 37°C and pH 8.0 is defined as an active unit.
<b>Reaction</b>	Endonucleolytic cleavage to 5'-phosphomononucleotide and 5'-phosphooligonucleotide end-products
<b>Notes</b>	This item requires custom production and lead time is between 5-9 weeks. We can custom produce according to your specifications.

### Storage and Shipping Information

**Storage** The product is stored at -20°C. The shelf life is 24 months. The product is stable under the condition of cold and airtight storage, and the activity is not significantly attenuated.