Certificate of Analysis



pHcRed1 Vector

Catalog No. Amount Lot Number

632410 20 μg Specified on product label.

Description

pHcRed1 is a bacterial expression vector which encodes the far-red fluorescent protein, HcRed1. HcRed1 was generated by mutagenesis of a non-fluorescent chromoprotein from the reef coral *Heteractis crispa*. The HcRed1 coding sequence has been human codon-optimized for higher expression in mammalian cells. The sequence upstream of HcRed1 has been converted to a Kozak consensus sequence to further increase the translation efficiency in eukaryotic cells.

Package Contents

20 μg pHcRed1 Vector

Storage Conditions

- Store at -20°C.
- Spin briefly to recover contents.
- Avoid repeated freeze/thaw cycles.

Shelf Life

• 1 year from date of receipt under proper storage conditions.

Storage Buffer

• 10 mM Tris-HCl (pH 8.0), 1 mM EDTA (pH 8.0)

Concentration

500 ng/μl

Shipping Conditions

• Dry ice (-70°C)

Propagation in E. coli

Recommended host strain: JM109

• Selectable marker: plasmid confers resistance to ampicillin (50 μg/ml) to E. coli hosts.

• E. coli replication origin: pUC

Copy number: High

Excitation and Emission Maxima of HcRed1

• Excitation: 588 nm

• Emission: $618 \pm 4 \text{ nm}$

pHcRed1 Vector

Quality Control Data

Plasmid Identity & Purity

Digestion with the indicated restriction enzymes produced fragments of the indicated sizes on a 0.8% agarose/EtBr gel:

Enzyme(s) Fragment(s) (kb)

KpnI 3.3 KpnI & NotI 2.6 & 0.7

• Vector identity was confirmed by sequencing.

 \bullet A₂₆₀/A₂₈₀: 1.8–2.0

It is certified that this product meets the above specifications, as reviewed and approved by the Quality Department.

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pHcRed1 Vector

CATALOG NO.

632410

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STATEMENT 72

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STATEMENT 24

DsRed2, DsRedExpress, DsRedExpress2, E2-Crimson, HcRed and pTimer are covered by one or more of the following U.S. Patent Nos. 7,166,444; 7,150,979; 7,157,565; 7,183,399; 7,858,844; 8,093,450; 8,461,769 and non-

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4/16/2021

Notice to Purchaser



U.S. international equivalents in some countries.

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