

Resource Summary Report

Generated by [RRID](#) on Aug 22, 2026

pcDNA-NES-ZapCmR2

RRID:Addgene_59015

Type: Plasmid

Proper Citation

RRID:Addgene_59015

Plasmid Information

URL: <http://www.addgene.org/59015>

Proper Citation: RRID:Addgene_59015

Insert Name: NES-ZapCmR2 genetically encoded cytosolic Zn(II) sensor

Organism: Synthetic

Bacterial Resistance: Ampicillin

Defining Citation: [PMID:23173058](#)

Vector Backbone Description: Backbone Marker:Invitrogen; Backbone Size:5500; Vector Backbone:pcDNA3.1(+); Vector Types:Mammalian Expression; Bacterial Resistance:Ampicillin

Comments: Genetically encoded, ratiometric, fluorescent biosensor. Contains nuclear exclusion signal sequence at N-terminus. Zn(II)-binding domain derived from the first 2 zinc fingers of Zap 1 from *Saccharomyces cerevisiae*. Contains Clover and mRuby fluorescent proteins. The Zn(II) binding domain of ZapCmR2 is derived from ZapCmR1.1. The first cysteine in the second zinc finger is mutated to histidine.

Plasmid Name: pcDNA-NES-ZapCmR2

Relevant Mutation: See comment

Record Creation Time: 20220422T222340+0000

Record Last Update: 20260815T081720+0000

Ratings and Alerts

No rating or validation information has been found for pcDNA-NES-ZapCmR2.

No alerts have been found for pcDNA-NES-ZapCmR2.

Data and Source Information

Source: [Addgene](#)

Usage and Citation Metrics

We have not found any literature mentions for this resource.