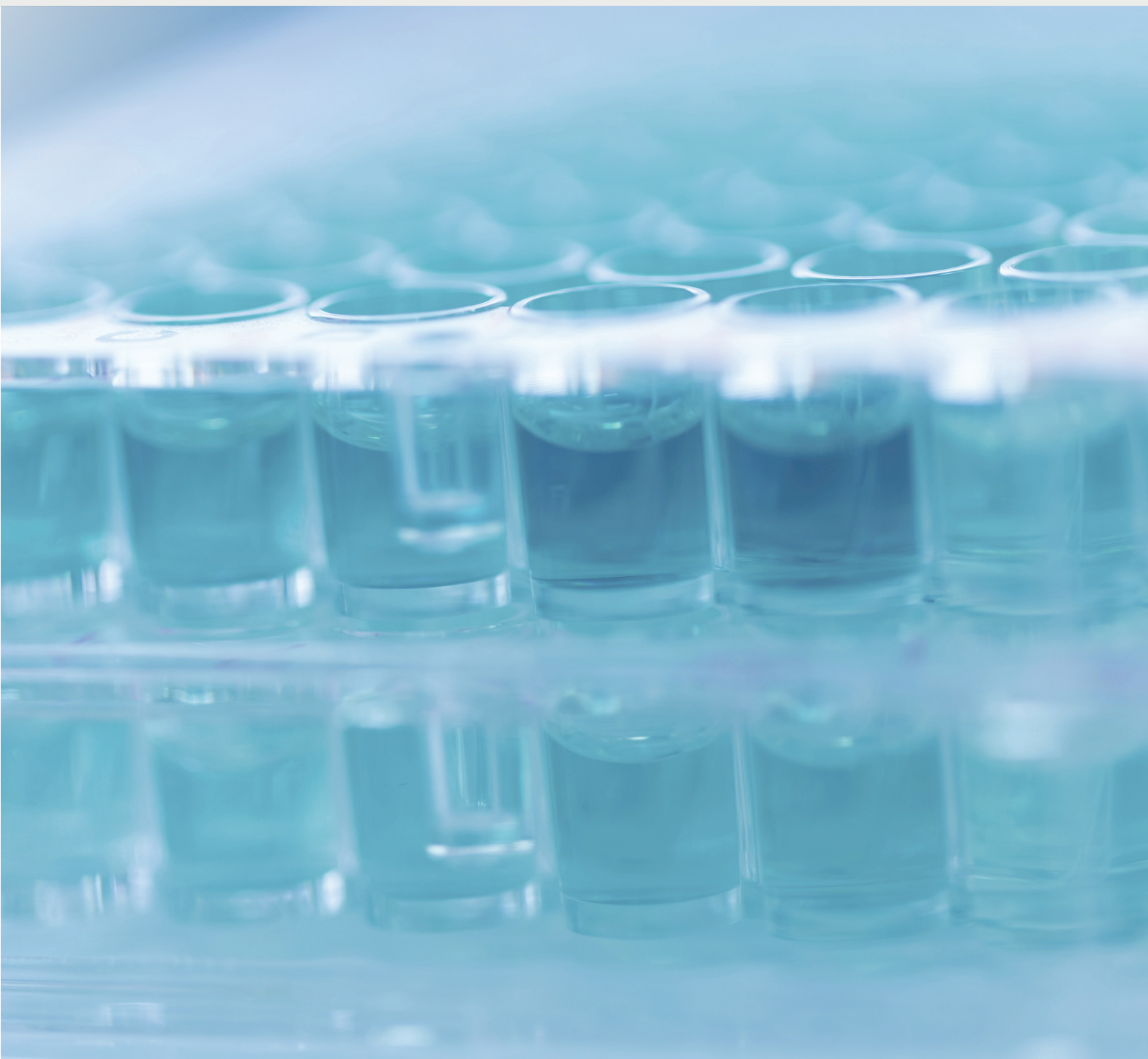




# Assay Kits

Flexible Formats for Biomarker Detection,  
Cell Analysis, and Enzyme Activity



# SENSITIVE, ACCURATE, REPRODUCIBLE ASSAYS

Entrust your precious samples, time, and research budget to assay kits from Enzo Life Sciences

Assay kits can be convenient time-saving tools to help accelerate your research, but not all assays are created equal. Some that promise convenience fail to deliver biologically relevant sensitivity, or the reproducibility needed for long-term studies, which can ultimately cost you more time and money. Whether you use ELISA kits for biomarker detection, assess cellular function with fluorescent assays, or screen enzyme modulators with activity assays, every Enzo assay kit offers something many other companies out there today do not—Experience. With over 40 years of assay development experience and state-of-the-art manufacturing facilities, Enzo ensures time-tested reproducibility.

## ELISA Kits

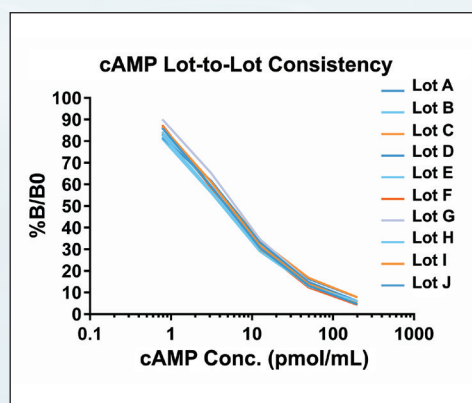
- Competitive and immunometric formats
- Multi-plate packs available
- Color-coded reagents reduce user error

## CELLESTIAL® Assays

- Novel assays for monitoring cellular processes
- Increased photostability and permeability
- Multiplex-compatible (GFP-CERTIFIED®) assays

## Enzyme Activity Assays

- High-purity, high-activity control enzymes
- Novel substrate/developer chemistry
- Reduce interference from candidate compounds



### Reliable Manufacturing Ensures Consistent Results

The graph above demonstrates the robust and reproducible nature of the competitive cAMP ELISA Kit (ADI-900-067A), showing standard curves from 10 kit lots manufactured over 10 years.

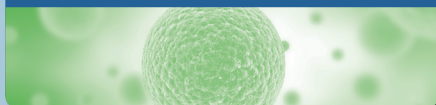
## Immunoassay Kits

Our catalog of nearly 300 ELISA kits includes sensitive, specific assays for relevant markers of cell viability, signaling pathways, steroid and peptide hormones, inflammation, and more. In addition to traditional antibody pair-based immunometric assays, our scientists specialize in the particularly challenging production of high-specificity competitive ELISAs for detection of small molecules.



## Cell-Based Assays

Our CELLESTIAL® portfolio of fluorescent probes and assay kits for cellular analysis provides a complete set of tools for monitoring cell viability, proliferation, death, oxidative stress and toxicology. Our dye-based assays have been optimized for the most demanding imaging applications including confocal microscopy, wide-field fluorescence microscopy, flow cytometry, and high content screening, where consistency and reproducibility are essential.



## Enzyme Activity Assays

Whether you are performing large-scale screens, or studying specific enzyme kinetics, our high activity enzymes, unique substrates, and convenient kits are designed to deliver high-quality hits.



# DETECT SMALL & LARGE ANALYTES ACCURATELY & EFFICIENTLY

We offer a large variety of immunoassay kits in both immunometric and competitive assay formats. As scientists and manufacturers of kits, we understand the critical nature of your research. Each kit is put through rigorous testing to ensure high precision, accuracy, sensitivity, and specificity. You can be confident that you will obtain reproducible results, day-after-day and lot-after-lot.

**Consistent** – strict quality control guidelines ensure reproducible results, lot-after-lot

**Trusted** – reliability highlighted in peer-reviewed publications for three decades

**Flexible** – adaptable to automated equipment for high-throughput systems

## Cyclic Nucleotides

The most sensitive colorimetric ELISA kits for detection of cAMP and cGMP, key second messenger signaling molecules.

Cyclic AMP Complete  
Cyclic GMP Complete  
Cyclic AMP Direct (Intracellular)  
Cyclic GMP Direct (Intracellular)  
Cyclic AMP (Extracellular)  
Cyclic GMP (Extracellular)

## Neuroscience

High-specificity, sensitive assays for biomarkers of neurodegeneration and neural signaling.

24(S) Hydroxycholesterol  
Dopamine  
Serotonin  
Survival Motor Neuron (SMN1)  
APPΔC31

## Programmed Cell Death

Quantify critical cell death pathway proteins. The perfect complement to our CELLESTIAL® cell-based assays.

p62 (Sequestosome 1)  
Bax  
Bcl-2  
Cytochrome C  
Survivin  
XIAP

## Hormones

Sensitive assays for steroid and peptide hormones that regulate stress, reproduction, metabolism, cardiovascular physiology, and more.

### Peptide

Angiotensin  
Bradykinin  
Endothelin-1  
Gastrin  
GLP-1  
Insulin  
LW-Hemorphin  
Oxytocin  
Proinsulin  
Prolactin  
Substance P  
Vasopressin

### Steroid

Aldosterone  
Corticosterone  
Cortisol  
DHEA  
17β-Estradiol  
Estril  
24(S) Hydroxycholesterol  
FSH  
LH  
Melatonin  
Progesterone  
Testosterone  
25(OH) Vitamin D

### Monoamine

Dopamine  
Histamine  
Serotonin

## Heat Shock & Oxidative Stress

The definitive collection of ELISA kits for heat shock and oxidative stress.

HSP27  
HSP60  
HSP70 & HSP70 High Sensitivity  
HSP90  
Grp75  
Grp78  
Grp94  
Heme Oxygenase-1  
HO-1  
DNA Damage (8-OHdG)

## Toxicology

Biomarker detection for assessing response to toxic compounds.

NGAL  
KIM-1

## Bioprocess

Sensitive ELISA kits for biotherapeutic characterization and residual contaminant detection.

PEGylated Protein  
Protein A  
HEK293T  
CHO HCP  
*E. coli* HCP

## Immunology

Broad portfolio of sensitive, high-specificity ELISA kits for inflammation and immunological studies.

Adiponectin	IL-33
CD40/CD40L	Leptin
CRP	LTB <sub>4</sub>
Cysteinyl Leukotrienes	Methotrexate
FasL	Nampt
12(S) HETE	NGAL
15(S) HETE	Osteoprotegerin
Histamine	8-iso-PGF <sub>2α</sub>
13(S) HODE	6-keto-PGF <sub>1α</sub>
IFN-γ	PGE <sub>2</sub> FPIA & CLIA
IL-1β	PGE <sub>2</sub> & PGE <sub>2</sub> High Sensitivity
IL-2	PGF <sub>2α</sub> & PGF <sub>2α</sub> High Sensitivity
IL-4	PSA
IL-5	RANKL
IL-6	Resistin
IL-8	TGF-β1
IL-10	TIMP-1
IL-12p70	TNF-α
IL-13	Transferrin
IL-17A	TXB <sub>2</sub>
	VEGF

## Wnt Pathway

Quantify key components of the Wnt pathway critical to cancer, development, bone remodeling, and neurodegeneration.

Dkk-1  
β-catenin

## FEATURED ELISA KITS

Product Name	Product #	Product Name	Product #
17β-Estradiol High Sensitivity ELISA Kit	ADI-900-174 †	IL-6 (human) High Sensitivity ELISA Kit	ENZ-KIT178
Bradykinin ELISA kit	ADI-900-206	Melatonin ELISA Kit	ENZ-Kit150
cAMP Complete ELISA Kit	ADI-900-163A †	Oxytocin ELISA Kit	ADI-900-153A †
Corticosterone ELISA Kit	ADI-900-097 †	PGE2 High Sensitivity ELISA Kit	ADI-931-001 †
Cortisol ELISA Kit	ADI-900-071 †	Progesterone ELISA Kit	ADI-900-011 †
Direct cAMP ELISA Kit	ADI-900-066A †	Prolactin ELISA Kit	ENZ-KIT161
Direct cGMP ELISA Kit	ADI-900-014 †	Protein A ELISA Kit	ADI-900-057
DNA Damage ELISA Kit	ADI-EKS-350	Serotonin ELISA Kit	ADI-900-175
Endothelin-1 ELISA Kit	ADI-900-020A	SMN ELISA Kit	ADI-900-209
Histamine ELISA Kit	ENZ-Kit140	Testosterone ELISA Kit	ADI-900-065 †
HO-1 (human) ELISA Kit	ADI-EKS-800	TXB <sub>2</sub> ELISA Kit	ADI-900-002 †

† Multi-plate pack size also available



# VISUALIZE CELLULAR RESPONSES WITH NOVEL FLUORESCENT PROBES

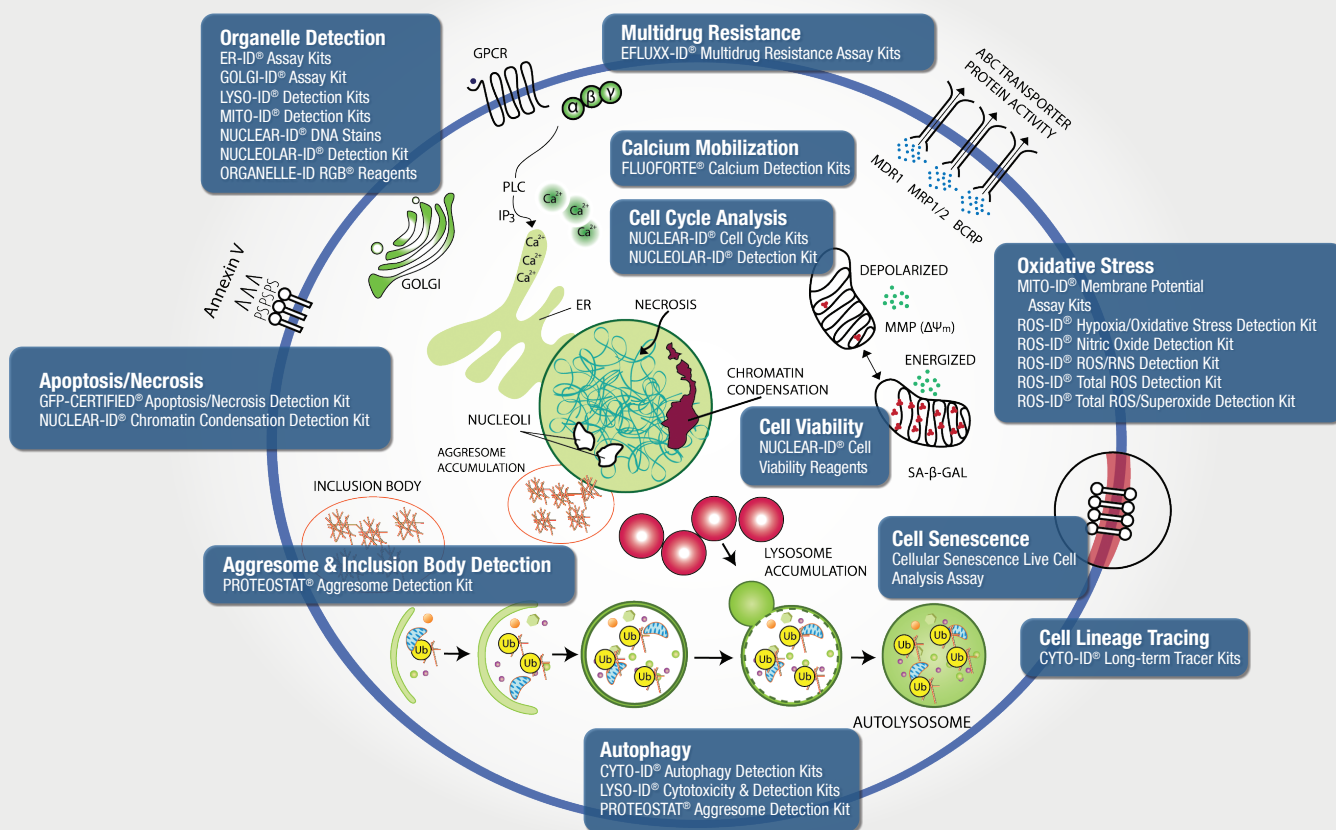
Our panel of CELLESTIAL® fluorescence-based live cell assays is built upon our extensive expertise in the design and synthesis of fluorescent probes. From simple organelle-specific dyes for imaging cell structure and determining cell viability, to more complex dyes for evaluating cell signaling and death pathways, our probes are developed to provide sensitivity, specificity, and convenience.

**Convenient** – Increased photostability reduces photobleaching

**Specific** – Reduce false positives by eliminating non-specific dye-associated artifacts

**Flexible** – Compatible with common dyes and fluorescent markers (i.e., GFP) for multiplex analysis

**Consistent** – Optimized for reproducibility on microplate, flow cytometry, or fluorescent microscopy platforms



## FEATURED CELLESTIAL® ASSAY KITS

Product Name	Product #	Flow Cytometry	Microplate	Microscopy
GFP-CERTIFIED® Apoptosis/Necrosis Detection Kit	ENZ-51002	•		•
Cell Counting Kit-8	ALX-850-039		•	
Cellular Senescence Live Cell Analysis Kit	ENZ-KIT130	•		•
CYTO-ID® Autophagy Detection Kits	ENZ-51031, KIT175	•	•	•
FLUOFORTE® Calcium Assay Kit	ENZ-51016, 51017	•	•	•
LDH Cytotoxicity WST Assay	ENZ-KIT157		•	
LYSO-ID® Red Detection Kit	ENZ-51015			•
MITO-ID® Membrane Potential Cytotoxicity Kit	ENZ-51019		•	
MITO-ID® Membrane Potential Detection Kit	ENZ-51018	•		•
PROTEOSTAT® Aggresome Detection Kit	ENZ-51035	•		•
ROS-ID® Hypoxia/Oxidative Stress Detection Kit	ENZ-51042	•		•
ROS-ID® Total ROS Detection Kit	ENZ-51011	•	•	•
ROS-ID® Total ROS/Superoxide Detection Kit	ENZ-51010	•	•	•

# SCREEN ENZYME MODULATORS WITH INNOVATIVE ACTIVITY ASSAYS

Over four decades of experience in the design and manufacture of active enzymes and their substrates support the development of an ever-expanding portfolio of biochemical assays. Our menu of scalable enzyme activity assays is anchored by our FLUOR DE LYS® deacetylase assay platform, featuring kits for screening modulators of HDAC and Sirtuin activity. We also offer FRET-based assays for matrix metalloproteinases (MMPs) and caspase activity, as well as phospho-specific antibody-based kinase assays. These assays exemplify the synergy of Enzo capabilities, assembling small peptide, active recombinant protein synthesis, fluorescent labeling and detection technologies, and antibody development into robust, reproducible assay kits.

**Quality** – High-activity, high-purity recombinant enzymes for high-quality hits

**Flexibility** – Bulk enzymes and substrates available for post-screening studies

**Innovation** – Patented substrate/developer chemistries in a variety of readout formats

## CONVENIENT SCREENING FORMATS FROM THE PIONEER IN NON-RADIOACTIVE HDAC & SIRTUIN ASSAYS

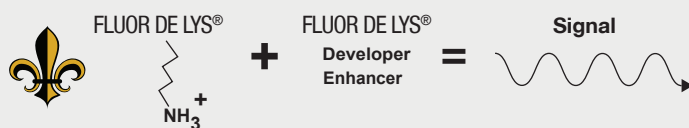
The FLUOR DE LYS® deacetylase assay platform revolutionized detection of HDAC and Sirtuin enzyme activity when it was introduced. Today, it continues as the gold standard in drug discovery research and target validation. FLUOR DE LYS® has freed researchers from cumbersome protocols required by radiolabeled or other modified histone-based methods. Our high-quality assays utilize patented substrate/developer chemistry in combination with high-activity, high-purity enzymes, to deliver more high-quality hits. Broad-class HDAC/Sirtuin screening assays are available in chemiluminescent, fluorescent, and colorimetric formats.

### Choose A Format to Fit Your Needs

**FLUOR DE LYS®**  
Robust fluorescent  
screening assays

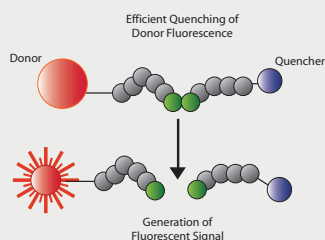
**COLOR DE LYS®**  
Option for standard  
absorbance plate readers

**CHEMILUM DE LYS®**  
Ideal for cross-validation  
of fluorescent assays



### Modified Substrate-Based Format

CHEMILUM DE LYS® HDAC/SIRT Drug Discovery Kit  
FLUOR DE LYS® HDAC & HDAC Green Assay Kits  
COLOR DE LYS® HDAC Activity Assay Kit  
FLUOR DE LYS® HDAC1/2/3/6/8 Specific Assay Kits  
FLUOR DE LYS® SIRT 1/2/3/5 Assay Kits  
Acetyltransferase & Methyltransferase Assay Kits



### FRET-Based Format

MMP-1/2/3/7/8/9/10/12/13/14/19/20 Assay Kits  
Caspase 1/3/8/9 Assay Kits  
ADAM17 (TACE) Drug Discovery Kit



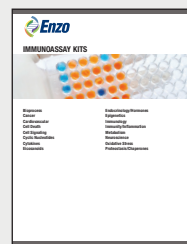
### Antibody-Based Format

PKA, Akt & PKC Activity Assay Kits

### FEATURED ENZYME ACTIVITY ASSAYS

Product Name	Product #	Product Name	Product #
Acetyltransferase Activity Kit	ADI-907-026	FLUOR DE LYS® SIRT1 Fluorometric Drug Discovery Kit	BML-AK555
Calcineurin Phosphatase Assay Kit	BML-AK804	MMP-1 Colorimetric Drug Discovery Kit	BML-AK404
DPPIV Drug Discovery Kit	BML-AK499	MMP-9 Colorimetric Drug Discovery Kit	BML-AK410
CHEMILUM DE LYS® HDAC/SIRT Chemiluminescent Drug Discovery Kit	BML-AK532	PKA Kinase Activity Kit	ADI-EKS-390A
FLUOR DE LYS® HDAC Fluorometric Activity Assay Kit	BML-AK500	PKC Kinase Activity Kit	ADI-EKS-420A
FLUOR DE LYS® Green HDAC Fluorometric Activity Kit	BML-AK530	Akt Kinase Activity Kit	ADI-EKS-400A

*You may also be interested in:*



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For local distributors and detailed product information visit us online:  
**[www.enzolifesciences.com](http://www.enzolifesciences.com)**

### Put our experience to work for you!

Our broad range of scientific expertise and industry-proven manufacturing capabilities enables us to provide a comprehensive set of assay kits to save you time and money!