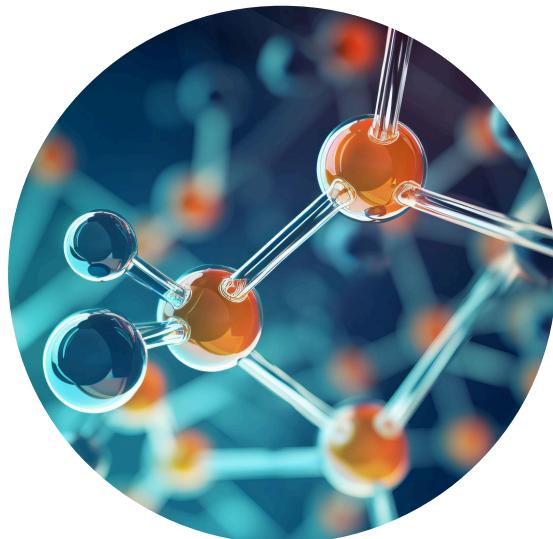
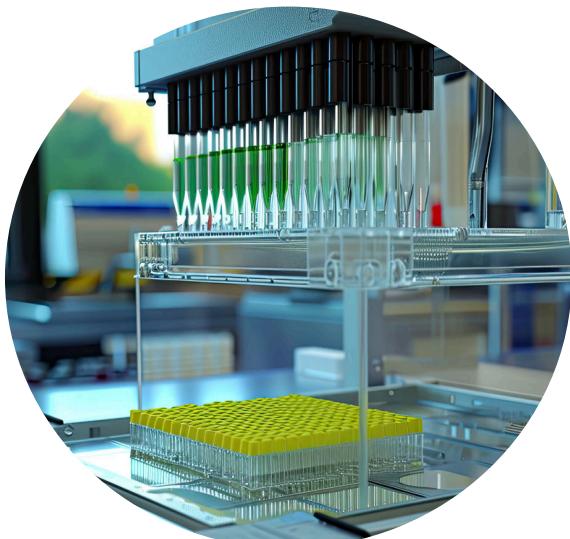


**Drug Target
Proteins**



**Drug Discovery
Assay Kits**



**Drug Discovery
Services**

Drug Target Proteins and More

Cataloged Drug Target Proteins:

Human Kras WT, Kras mutants G12C, G12D, G12R, G12V, G13D with GDP or GppNHp loaded, SOS1, cRAF, CDKs, PKM2, MNK2, Bcl2, DNA Polymerase Theta (POLQ), MST1, PKMYT1, LAG3, FGL1, OX40, OX40L, CD27, CD40, CD47, CD70, CD137, CD137L, C155, TIGIT, SIRP-alpha, GITR, GITRL, PD-1, PD-L1, CTLA4, B7-1, B7-2, Malic enzyme 1, 2, & 3 (ME1, ME2, ME3). SARS-CoV-2 Mpro/3CL, PLpro/NSP3, NSP7, NSP8, Helicase/NSP13.

Cataloged Cytokines/Growth Factors:

FGF-basic, FGF-acidic, VEGF, Human LIF, Mouse LIF, Human Sonic Hedgehog.

Cataloged Proteases:

TEV, SUMO (Ulp1), PreScission (HRV 3C), YopH, BirA, Sortase A.

Why Choose Aurora Biolabs Recombinant Proteins?

Our History

Aurora Biolab is a San Diego CA biotech company located in the center of drug discovery and biotech hub in Sorrento Valley. It has close to two decades of manufacturing highly pure recombinant proteins for X-ray crystallography and CryoEM drug discvoery applications.

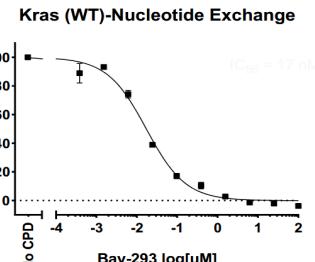
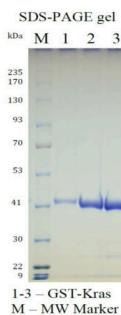
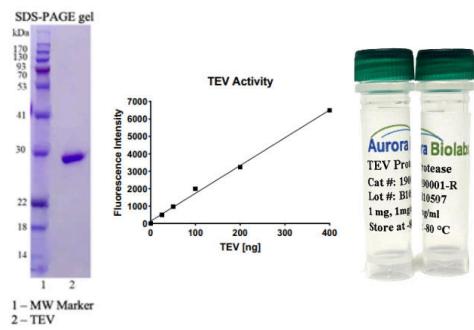
Our Capacities

At our state-of-the-art facility, we have the capabilities to manufacture recombinant proteins in micro-gram to multi-gram levels with protein length from 50 amino acids to 1000+ amino acids. Expression sytems we utilize include *E. coli*, Sf9 insect cells, mammalian cells (CHO, HEK293) (transient or stable), and Lentivirus.

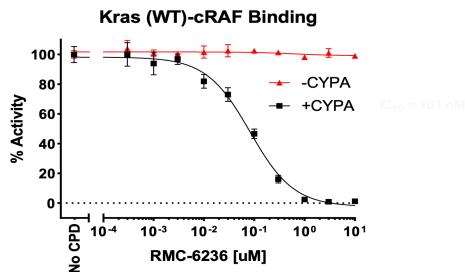
Our Recombinant Proteins Are Known For:

- Batch-to-Batch Consistency
- Stringent Quality Control
- High Protein Purity
- Bioactivity

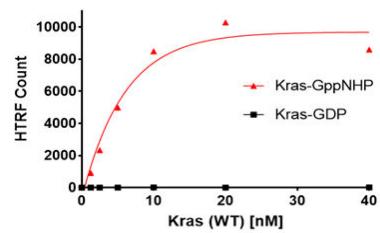
TEV Protease



Kras Recombinant Proteins



Kras (WT)-cRAF Binding



TR-FRET Assay Kits

Kras TR-FRET Inhibitor Screening Kits:

Kras (WT/G12C/G12D/G12/G13D)-cRAF-CYPA Inhibitor Screening Assay Kits (384, 4000 rxn*)

Kras (WT/G12C/G12D/G12R/G12V/G13D) Nucleotide Exchange Assay Kits (384, 4000 rxn*)

Kras (WT/G12C/G12D/G12R/G12V/G13D) cRAF Binding Assay Kits (384, 4000 rxn*)

*Trial size 40- and 100-rxn assay kits available

Other Drug Targets Inhibitor Screening Kits: OX40/OX40L Inhibitor Binding Assay Kit (384 rxn), PD-1/PD-L1 Inhibitor Binding Assay Kit (384 rxn), DNA Polymerase Theta Activity Assay Kit (96, 384 rxn), WEE1 Binding Assay Kit (384 rxn), PKMYT1 Binding Assay Kit (384 rxn), eIF4E/eIF4G Binding Assay Kit (384 rxn), IDO1 Activity Assay Kit (96 rxn), Caspase-3 Activity Assay Kit (384 rxn), PARP1 Trapping Assay Kit (384 rxn), PARP2 Trapping Assay Kit (384 rxn), CDK2/CyclinE1 Assay Kit (384 rxn), CDK2/CyclinA2 Assay Kit (384 rxn)

PROTAC Ligand Screening Kits:

VHL Binding Assay Kit (384 rxn), Cereblon-4C Binding Assay Kit (384 rxn)

SARS-CoV-2 Kits: SARS-CoV-2 Mpro (3CL Protease) Assay Kit (96 rxn), SARS-CoV-2 Papain-like (PLpro) Protease Assay Kit (96 rxn), SARS-CoV-2 Nucleocapsid Protein Binding Kit (for mouse antibody) (384 rxn), SARS-CoV-2 Nucleocapsid Protein Binding Kit (for mouse antibody) (384 rxn)

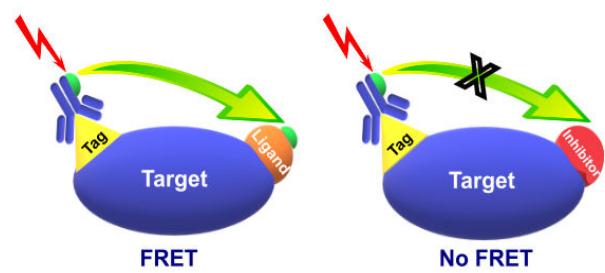
Other Useful Kits:

Test TEV Activity Assay Kit (96 rxn), T7 High Yield RNA Synthesis Kit (25, 50, 100 rxn)

Why Choose Aurora Biolabs Assay Kits?

Why TR-FRET

TR-FRET Assay is well known to be more sensitive than traditional enzyme-based assays due to the lanthanide-based donor fluorophores, which have long fluorescence lifetimes, and time-resolved detection, which minimizes background fluorescence interference.



Our Assay Kits Are Known For:

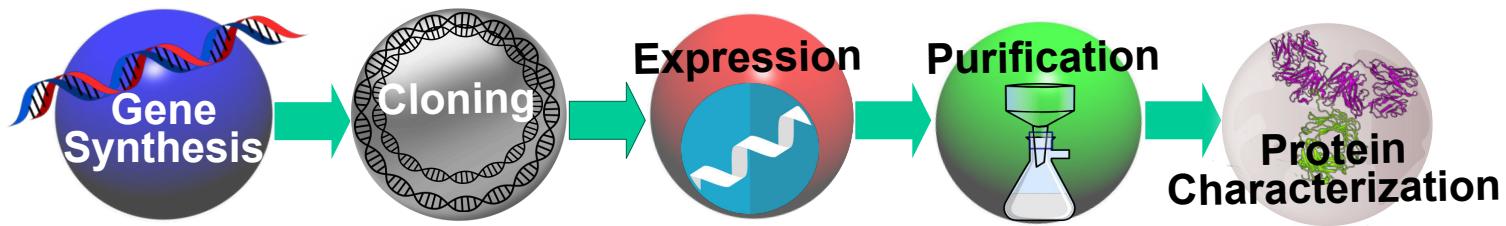
- Proven Convenience - All reagents and even a run plate is included.
- Proven Procedure - Optimized step-by-step protocols are provided.
- High Sensitivity and High Throughput Capabilities.
- Expert Technical Support.

Protocol Summary			
Component	Negative Control	Positive Control	Inhibitor Test
AB buffer	4 µl	4 µl	4 µl
Kras (WT) protein			
CD Buffer	2 µl	2 µl	
Inhibitor solution			2 µl
cRAF protein	4 µl	4 µl	4 µl
Dye solution	10 µl	10 µl	10 µl
Total Volume	20 µl	20 µl	20 µl

Components

Catalog number	Item	Incubate at room temperature for 30 minutes.	
5727-OK-B	2X Kras Binding buffer	25 mL	-20°C
5727-4121-T2P	Recombinant human Tag2-Kras (WT), GppNpG loaded	15 µL	-80°C
5272-2972	Recombinant Cyclophilin A (CYPA)	200 µL	-80°C
7237231-T1	Recombinant human Tag1-cRAF, RBD	8 µL	-80°C
37882	Terbium-labeled anti-Tag2 antibody	20 µL	-80°C
44732	Fluorescence labeled anti-Tag1 antibody	20 µL	-80°C
	384-well microplate	1	Room temperature

One-Stop Aurora Biolabs Drug Discovery Services



Why Choose Our Drug Discovery Services?

For almost 20 years, we have worked with clients in both academia and industry, providing them with services from protein synthesis to protein characterization to assay development and screening for novel compounds in drug discovery. Our record speaks for itself: 100+ drug discovery projects completed to date for 70+ pharma partners, 40+ INDs submitted by our clients, and 20+ scientific papers published.

Custom Assay Development Services

Our experienced team of 10 PhD level scientists have provided assay development services for cell-based and biochemical assays. Our expert assay development scientists are well-versed in enzyme activity assays, binding assays, protein-protein interaction assays, viability, proliferation, and cytotoxicity assays, reporter gene assays, receptor pharmacology assays, apoptosis and cell death assays - just to name a few.

Assay Screening Services

Aurora Biolabs drug discovery assay screening services are time-tested and have provided our clients with a high hit rate that results in novel compounds of therapeutic significance. We have 150,000 compounds from in-house libraries and can also screen compound libraries provided by customers. We have the expertise in designing high-throughput and sensitive assays and the equipment to carry out high-throughput screening at our facility in San Diego, CA.

Library	Compounds
Chembridge	40,000
Maybridge	14,080
LifeChemicals	28,160
Enamine 1	10,240
Enamine 2	20,160
NANOSYN	31,365
Selleckchem	1,585

Past Client Examples

