QuantiNova® LNA® Probe PCR Focus Panels (Rotor-Gene® Format)

Human Cancer Drug Targets

Cat. no. 249955 UPHS-507ZR

For study focus gene expression analysis

Shipping and storage

QuantiNova LNA Probe PCR Focus Panels are shipped at room temperature. Immediately upon receipt, they should be stored protected from light at 2–8°C for short term storage or at –30°C to –15°C for long time storage. Under these conditions, all components are stable for at least 12 months.

Note: Open the package and store the products appropriately immediately upon receipt.

For optimal performance, QuantiNova LNA Probe PCR Focus Panels should be used together with the QuantiNova Reverse Transcription Kit for cDNA synthesis and the QuantiNova Probe PCR Kit (Mastermix) for PCR.

Panel layout (Rotor-Gene): QuantiNova LNA Probe PCR Focus Panel

The 96 real-time assays in the Rotor-Gene format are located in wells 1–96 of the Rotor-Disc® (plate A1–A12=Rotor-Disc 1–12, plate B1–B12=Rotor-Disc 13–24, etc.). To maintain data analysis compatibility, wells 97–100 do not contain real-time assays but will contain master mix to account for weight balance. Refer to the QuantiNova LNA Probe PCR Handbook at **www.qiagen.com** for further details.

	1	2	3	4	5	6	7	8	9	10	11	12
A	ABCC1	AKT1	AKT2	ATF2	AURKA	AURKB	AURKC	BCL2	BIRC5	CDC25A	CDK1	CDK2
B	CDK4	CDK5	CDK7	CDK8	CDK9	CTSB	CTSD	CTSL	CTSS	EGFR	ERBB2	ERBB3
C	ERBB4	ESR1	ESR2	VEGFD	FLT1	FLT4	GRB2	GSTP1	HDAC1	HDAC11	HDAC2	HDAC3
D	HDAC4	HDAC6	HDAC7	HDAC8	HIF1A	HRAS	HSP90AA1	HSP90B1	IGF1	IGF1R	IGF2	IRF5
E	KDR	KIT	KRAS	MDM2	MDM4	MTOR	NFKB1	NRAS	NTN3	PARP1	PARP2	PARP4
F	PDGFRA	PDGFRB	PGR	PIK3C2A	PIK3C3	PIK3CA	PLK1	PLK2	PLK3	PLK4	PRKCA	PRKCB
G	PRKCD	PRKCE	PTGS2	RHOA	RHOB	TERT	TNKS	TOP2A	TOP2B	TP53	TXN	TXNRD1
H	ACTB	B2M	GAPDH	HPRT1	RPLP0	HGDC	QIC	QIC	QIC	PPC	PPC	PPC

Gene table: QuantiNova LNA Probe PCR Focus Panel

Position	Assay	Name	Symbol	Ensembl ID	Description
A01	UPFH0348703	ENST00000575422.5	ABCC1	ENSG00000103222	ATP binding cassette subfamily C member 1 Source HGNC Symbol Acc HGNC 51
A02	UPFH0453992	ENST00000555528.5	AKT1	ENSG00000142208	AKT serine/threonine kinase 1 Source HGNC Symbol Acc HGNC 391
A03	UPFH0246744	ENST00000441941.6	AKT2	ENSG00000105221	AKT serine/threonine kinase 2 Source HGNC Symbol Acc HGNC 392
A04	UPFH1132243	ENST00000426833.7	ATF2	ENSG00000115966	activating transcription factor 2 Source HGNC Symbol Acc HGNC 784
A05	UPFH0528207	ENST00000347343.6	AURKA	ENSG00000087586	aurora kinase A Source HGNC Symbol Acc HGNC 11393
A06	UPFH1132261	ENST00000316199.10	AURKB	ENSG00000178999	aurora kinase B Source HGNC Symbol Acc HGNC 11390
A07	UPFH0080001	ENST00000598785.5	AURKC	ENSG00000105146	aurora kinase C Source HGNC Symbol Acc HGNC 11391
A08	UPFH1132900	ENST00000333681.5	BCL2	ENSG00000171791	BCL2, apoptosis regulator Source HGNC Symbol Acc HGNC 990
A09	UPFH1132779	ENST00000301633.8	BIRC5	ENSG00000089685	baculoviral IAP repeat containing 5 Source HGNC Symbol Acc HGNC 593
A10	UPFH0432792	ENST00000302506.7	CDC25A	ENSG00000164045	cell division cycle 25A Source HGNC Symbol Acc HGNC 1725
A11	UPFH1132307	ENST00000614696.4	CDK1	ENSG00000170312	cyclin dependent kinase 1 Source HGNC Symbol Acc HGNC 1722
A12	UPFH1132961	ENST00000266970.9	CDK2	ENSG00000123374	cyclin dependent kinase 2 Source HGNC Symbol Acc HGNC 1771
B01	UPFH0291148	ENST00000549606.5	CDK4	ENSG00000135446	cyclin dependent kinase 4 Source HGNC Symbol Acc HGNC 1773
B02	UPFH0609948	ENST00000485972.6	CDK5	ENSG00000164885	cyclin dependent kinase 5 Source HGNC Symbol Acc HGNC 1774
B03	UPFH1132310	ENST00000256443.8	CDK7	ENSG00000134058	cyclin dependent kinase 7 Source HGNC Symbol Acc HGNC 1778
B04	UPFH1132311	ENST00000381527.8	CDK8	ENSG00000132964	cyclin dependent kinase 8 Source HGNC Symbol Acc HGNC 1779
B05	UPFH0331422	ENST00000480353.5	CDK9	ENSG00000136807	cyclin dependent kinase 9 Source HGNC Symbol Acc HGNC 1780
B06	UPFH1132795	ENST00000345125.7	CTSB	ENSG00000164733	cathepsin B Source HGNC Symbol Acc HGNC 2527
B07	UPFH1132343	ENST00000637815.1	CTSD	ENSG00000117984	cathepsin D Source HGNC Symbol Acc HGNC 2529
B08	UPFH1132904	ENST00000342020.5	CTSL	ENSG00000135047	cathepsin L Source HGNC Symbol Acc HGNC 2537
B09	UPFH1132344	ENST00000368985.8	CTSS	ENSG00000163131	cathepsin S Source HGNC Symbol Acc HGNC 2545
B10	UPFH1132381	ENST00000420316.6	EGFR	ENSG00000146648	epidermal growth factor receptor Source HGNC Symbol Acc HGNC 3236
B11	UPFH1132388	ENST00000541774.5	ERBB2	ENSG00000141736	erb-b2 receptor tyrosine kinase 2 Source HGNC Symbol Acc HGNC 3430
B12	UPFH0049356	ENST00000267101.7	ERBB3	ENSG00000065361	erb-b2 receptor tyrosine kinase 3 Source HGNC Symbol Acc HGNC 3431
C01	UPFH0292006	ENST00000436443.5	ERBB4	ENSG00000178568	erb-b2 receptor tyrosine kinase 4 Source HGNC Symbol Acc HGNC 3432
C02	UPFH0599047	ENST00000206249.7	ESR1	ENSG00000091831	estrogen receptor 1 Source HGNC Symbol Acc HGNC 3467
C03	UPFH0094598	ENST00000358599.9	ESR2	ENSG00000140009	estrogen receptor 2 Source HGNC Symbol Acc HGNC 3468
C04	UPFH1132399	ENST00000297904.4	VEGFD	ENSG00000165197	vascular endothelial growth factor D Source HGNC Symbol Acc HGNC 3708
C05	UPFH1132400	ENST00000541932.5	FLT1	ENSG00000102755	fms related tyrosine kinase 1 Source HGNC Symbol Acc HGNC 3763
C06	UPFH0098802	ENST00000514810.1	FLT4	ENSG00000037280	fms related tyrosine kinase 4 Source HGNC Symbol Acc HGNC 3767
C07	UPFH1132426	ENST00000392564.5	GRB2	ENSG00000177885	growth factor receptor bound protein 2 Source HGNC Symbol Acc HGNC 4566
C08	UPFH0262059	ENST00000398606.8	GSTP1	ENSG00000084207	glutathione S-transferase pi 1 Source HGNC Symbol Acc HGNC 4638
C09	UPFH1132434	ENST00000373548.8	HDAC1	ENSG00000116478	histone deacetylase 1 Source HGNC Symbol Acc HGNC 4852
C10	UPFH1132436	ENST00000295757.8	HDAC11	ENSG00000163517	histone deacetylase 11 Source HGNC Symbol Acc HGNC 19086
		ENST00000519		ENSG00000	

Position	Assay	Name	Symbol	Ensembl ID	Description
C11	UPFH1132437	065.6	HDAC2	196591	histone deacetylase 2 Source HGNC Symbol Acc HGNC 4853
C12	UPFH1132438	ENST00000305264.8	HDAC3	ENSG00000171720	histone deacetylase 3 Source HGNC Symbol Acc HGNC 4854
D01	UPFH0101499	ENST00000345617.7	HDAC4	ENSG00000068024	histone deacetylase 4 Source HGNC Symbol Acc HGNC 14063
D02	UPFH0614515	ENST00000334136.10	HDAC6	ENSG00000094631	histone deacetylase 6 Source HGNC Symbol Acc HGNC 14064
D03	UPFH1132440	ENST00000380610.8	HDAC7	ENSG00000061273	histone deacetylase 7 Source HGNC Symbol Acc HGNC 14067
D04	UPFH0383848	ENST00000373573.9	HDAC8	ENSG00000147099	histone deacetylase 8 Source HGNC Symbol Acc HGNC 13315
D05	UPFH1132447	ENST00000394997.5	HIF1A	ENSG00000100644	hypoxia inducible factor 1 subunit alpha Source HGNC Symbol Acc HGNC 4910
D06	UPFH1132981	ENST00000311189.8	HRAS	ENSG00000174775	HRas proto-oncogene, GTPase Source HGNC Symbol Acc HGNC 5173
D07	UPFH0292880	ENST00000334701.11	HSP90AA1	ENSG00000080824	heat shock protein 90 alpha family class A member 1 Source HGNC Symbol Acc HGNC 5253
D08	UPFH1132456	ENST00000299767.10	HSP90B1	ENSG00000166598	heat shock protein 90 beta family member 1 Source HGNC Symbol Acc HGNC 12028
D09	UPFH0229443	ENST00000337514.10	IGF1	ENSG00000017427	insulin like growth factor 1 Source HGNC Symbol Acc HGNC 5464
D10	UPFH0237955	ENST00000650285.1	IGF1R	ENSG00000140443	insulin like growth factor 1 receptor Source HGNC Symbol Acc HGNC 5465
D11	UPFH0479939	ENST00000418738.2	IGF2	ENSG00000167244	insulin like growth factor 2 Source HGNC Symbol Acc HGNC 5466
D12	UPFH1132492	ENST00000479582.5	IRF5	ENSG00000128604	interferon regulatory factor 5 Source HGNC Symbol Acc HGNC 6120
E01	UPFH0596732	ENST00000263923.5	KDR	ENSG00000128052	kinase insert domain receptor Source HGNC Symbol Acc HGNC 6307
E02	UPFH0545239	ENST00000288135.5	KIT	ENSG00000157404	KIT proto-oncogene receptor tyrosine kinase Source HGNC Symbol Acc HGNC 6342
E03	UPFH0376060	ENST00000557334.5	KRAS	ENSG00000133703	KRAS proto-oncogene, GTPase Source HGNC Symbol Acc HGNC 6407
E04	UPFH1132546	ENST00000393416.6	MDM2	ENSG00000135679	MDM2 proto-oncogene Source HGNC Symbol Acc HGNC 6973
E05	UPFH0266550	ENST00000367180.5	MDM4	ENSG00000198625	MDM4, p53 regulator Source HGNC Symbol Acc HGNC 6974
E06	UPFH1132560	ENST00000361445.8	MTOR	ENSG00000198793	mechanistic target of rapamycin kinase Source HGNC Symbol Acc HGNC 3942
E07	UPFH1132828	ENST00000226574.9	NFKB1	ENSG00000109320	nuclear factor kappa B subunit 1 Source HGNC Symbol Acc HGNC 7794
E08	UPFH0189023	ENST00000369535.5	NRAS	ENSG00000213281	NRAS proto-oncogene, GTPase Source HGNC Symbol Acc HGNC 7989
E09	UPFH0166058	ENST00000293973.1	NTN3	ENSG00000162068	netrin 3 Source HGNC Symbol Acc HGNC 8030
E10	UPFH0203594	ENST00000490921.5	PARP1	ENSG00000143799	poly(ADP-ribose) polymerase 1 Source HGNC Symbol Acc HGNC 270
E11	UPFH0154861	ENST00000527915.5	PARP2	ENSG00000129484	poly(ADP-ribose) polymerase 2 Source HGNC Symbol Acc HGNC 272
E12	UPFH0477164	ENST00000381989.4	PARP4	ENSG00000102699	poly(ADP-ribose) polymerase family member 4 Source HGNC Symbol Acc HGNC 271
F01	UPFH1132609	ENST00000508170.5	PDGFRA	ENSG00000134853	platelet derived growth factor receptor alpha Source HGNC Symbol Acc HGNC 8803
F02	UPFH1132610	ENST00000261799.9	PDGFRB	ENSG00000113721	platelet derived growth factor receptor beta Source HGNC Symbol Acc HGNC 8804
F03	UPFH0586168	ENST00000617858.4	PGR	ENSG00000082175	progesterone receptor Source HGNC Symbol Acc HGNC 8910
F04	UPFH0596049	ENST00000531428.1	PIK3C2A	ENSG00000011405	phosphatidylinositol-4-phosphate 3-kinase catalytic subunit type 2 alpha Source HGNC Symbol Acc HGNC 8971
F05	UPFH1132623	ENST00000262039.9	PIK3C3	ENSG00000078142	phosphatidylinositol 3-kinase catalytic subunit type 3 Source HGNC Symbol Acc HGNC 8974
F06	UPFH0109251	ENST00000462255.1	PIK3CA	ENSG00000121879	phosphatidylinositol-4,5-bisphosphate 3-kinase catalytic subunit alpha Source HGNC Symbol Acc HGNC 8975
F07	UPFH0561784	ENST00000300093.9	PLK1	ENSG00000166851	polo like kinase 1 Source HGNC Symbol Acc HGNC 9077
F08	UPFH0340200	ENST00000509555.5	PLK2	ENSG00000145632	polo like kinase 2 Source HGNC Symbol Acc HGNC 19699
F09	UPFH0530460	ENST00000476731.1	PLK3	ENSG00000173846	polo like kinase 3 Source HGNC Symbol Acc HGNC 2154
F10	UPFH0230542	ENST00000510192.1	PLK4	ENSG00000142731	polo like kinase 4 Source HGNC Symbol Acc HGNC 11397

Position	Assay	Name	Symbol	Ensembl ID	Description
F11	UPFH0607768	ENST00000578063.5	PRKCA	ENSG00000154229	protein kinase C alpha Source HGNC Symbol Acc HGNC 9393
F12	UPFH0529104	ENST00000646168.1	PRKCB	ENSG00000166501	protein kinase C beta Source HGNC Symbol Acc HGNC 9395
G01	UPFH0316461	ENST00000651505.1	PRKCD	ENSG00000163932	protein kinase C delta Source HGNC Symbol Acc HGNC 9399
G02	UPFH0050276	ENST00000306156.8	PRKCE	ENSG00000171132	protein kinase C epsilon Source HGNC Symbol Acc HGNC 9401
G03	UPFH1132642	ENST00000367468.10	PTGS2	ENSG00000073756	prostaglandin-endoperoxide synthase 2 Source HGNC Symbol Acc HGNC 9605
G04	UPFH1132657	ENST00000445425.4	RHOA	ENSG00000067560	ras homolog family member A Source HGNC Symbol Acc HGNC 667
G05	UPFH0026449	ENST00000272233.5	RHOB	ENSG00000143878	ras homolog family member B Source HGNC Symbol Acc HGNC 668
G06	UPFH0248987	ENST00000310581.9	TERT	ENSG00000164362	telomerase reverse transcriptase Source HGNC Symbol Acc HGNC 11730
G07	UPFH0321421	ENST00000517989.1	TNKS	ENSG00000173273	tankyrase Source HGNC Symbol Acc HGNC 11941
G08	UPFH0203229	ENST00000578412.1	TOP2A	ENSG00000131747	DNA topoisomerase II alpha Source HGNC Symbol Acc HGNC 11989
G09	UPFH1132735	ENST00000435706.6	TOP2B	ENSG00000077097	DNA topoisomerase II beta Source HGNC Symbol Acc HGNC 11990
G10	UPFH0565795	ENST00000269305.8	TP53	ENSG00000141510	tumor protein p53 Source HGNC Symbol Acc HGNC 11998
G11	UPFH1132744	ENST00000374517.6	TXN	ENSG00000136810	thioredoxin Source HGNC Symbol Acc HGNC 12435
G12	UPFH0461384	ENST00000526691.5	TXNRD1	ENSG00000198431	thioredoxin reductase 1 Source HGNC Symbol Acc HGNC 12437
H01	UPFH1132936	ENST00000646664.1	ACTB	ENSG00000075624	actin beta Source HGNC Symbol Acc HGNC 132
H02	UPFH1132937	ENST00000544417.5	B2M	ENSG00000166710	beta-2-microglobulin Source HGNC Symbol Acc HGNC 914
H03	UPFH1132938	ENST00000229239.10	GAPDH	ENSG00000111640	glyceraldehyde-3-phosphate dehydrogenase Source HGNC Symbol Acc HGNC 4141
H04	UPFH1132939	ENST00000298556.8	HPRT1	ENSG00000165704	hypoxanthine phosphoribosyltransferase 1 Source HGNC Symbol Acc HGNC 5157
H05	UPFH1132941	ENST00000392514.9	RPLP0	ENSG00000089157	ribosomal protein lateral stalk subunit P0 Source HGNC Symbol Acc HGNC 10371
H06	UPFH1126608	UPL_HGDC	HGDC	UPL_HGDC	Human Genomic DNA Contamination
H07	UPFH1126606	UPL_QIC	QIC	UPL_QIC	QuantiNova Internal Control
H08	UPFH1126606	UPL_QIC	QIC	UPL_QIC	QuantiNova Internal Control
H09	UPFH1126606	UPL_QIC	QIC	UPL_QIC	QuantiNova Internal Control
H10	UPFH1126605	UPL_PPC	PPC	UPL_PPC	Positive PCR Control
H11	UPFH1126605	UPL_PPC	PPC	UPL_PPC	Positive PCR Control
H12	UPFH1126605	UPL_PPC	PPC	UPL_PPC	Positive PCR Control

Related products

Product	Contents	Cat. no.
QuantiNova LNA Probe PCR QC Panel	These panels are designed to assess the quality of RNA samples before characterization using QuantiNova LNA Probe PCR Focus Panels; available in 96-well, 384-well, and Rotor-Disc 100 formats	249945
QuantiNova Reverse Transcription Kit (10)*	For 10 x 20 µl reactions: 20 µl 8x gDNA Removal Mix, 10 µl Reverse Transcription Enzyme, 40 µl Reverse Transcription Mix (containing RT primers), 20 µl Internal Control RNA, 1.9 ml RNase-Free Water	205410
QuantiNova Probe RT-PCR Kit (100)*	For 100 x 20 µl reactions: 1 ml QuantiNova Probe RT-PCR Master Mix, 20 µl QuantiNova Probe RT Mix, 20 µl Internal Control RNA, 500 µl Yellow Template Dilution Buffer, 250 µl ROX Reference Dye, 1.9 µl RNase-Free Water	208352
QuantiNova Probe PCR Kit (100)*	For 100 x 20 µl reactions: 1 ml 2x QuantiNova Probe PCR Master Mix, 500 µl QuantiNova Yellow Template Dilution Buffer, 250 µl QN ROX Reference Dye, 1.9 ml Water	208252

*Larger kit sizes available.

The QuantiNova LNA Probe PCR Focus Panels are intended for molecular biology applications. These products are not intended for the diagnosis, prevention or treatment of a disease.

For up-to-date licensing information and product-specific disclaimers, see the respective QIAGEN kit handbook or user manual. QIAGEN kit handbooks and user manuals are available at www.qiagen.com or can be requested from QIAGEN Technical Services or your local distributor.