

QuantiNova® LNA® PCR Focus Panels (96-Well Format and 384-Well [4 x 96] Format)

Rat Cardiovascular Disease

Cat. no. 249950 SBRN-174ZA

For study focus gene expression analysis

Shipping and storage

QuantiNova LNA PCR Focus Panels are shipped at ambient temperature. Immediately upon receipt, they should be stored 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 PCR Focus Panels should be used together with the QuantiNova Reverse Transcription Kit for cDNA synthesis and the QuantiNova SYBR® Green PCR Kit (Mastermix) for PCR.

Panel layout (96-well): QuantiNova LNA PCR Focus Panel

For the 384-well (4 × 96) PCR panels, genes are present in a staggered format. Refer to the QuantiNova LNA PCR System Handbook at www.qiagen.com for further details.

	1	2	3	4	5	6	7	8	9	10	11	12
A	Ace	Actc1	Adra1a	Adra1b	Adra1d	Adrb1	Adrb2	Adrb3	Aebp1	Agtr1a	Anxa4	Ar
B	Atp2a2	Atp5f1a	C6	Ccl11	Ccl2	Ccnd1	Cdkn1b	Col11a1	Col1a1	Col3a1	Creb5	Crem
C	Cryab	Crym	Ccn2	Cxcl12	Dcn	Dmd	Dusp6	Enah	Epor	F2r	Fn1	Frzb
D	G0s2	Gja1	Hmgcl	Hmgcr	Hmgcn2	AABR0702695 7.1	Maoa	Mapk1	Mapk8	Mmp13	Mei2	Myh10
E	Myh6	Ndufb5	Nebi	Nfia	Nkx2-5	Nppa	Nppb	Npr1	Npr2	Npr3	AABR0703175 6.1	Nr3c2
F	Pde3a	Pde3b	Pde5a	Pde7a	Postn	Ptn	Rarres1	Rassf1	Ren	Rtn4	S100a1	S100a8
G	LOC299282	Sfrp4	Slc12a1	Snca	Spock1	Stat1	Tcf4	Thbs2	Tnni3	Tnnf2	Ubb	Zyx
H	Actb	B2m	Hprt1	Ldha	Rplp1	RGDC	QIC	QIC	QIC	PPC	PPC	PPC

Gene table: QuantiNova LNA PCR Focus Panel

Position	Assay	Name	Symbol	Ensembl ID	Description
A01	SBR1133139	ENSRNOT00000010627.8	Ace	ENSRNOG0000062101	angiotensin I converting enzyme Source RGD Symbol Acc 2493
A02	SBR1156709	ENSRNOT00000011773.4	Actc1	ENSRNOG0000008536	actin, alpha, cardiac muscle 1 Source RGD Symbol Acc 2026
A03	SBR1152290	ENSRNOT00000012736.3	Adra1a	ENSRNOG0000009522	adrenoceptor alpha 1A Source RGD Symbol Acc 2055
A04	SBR1213334	ENSRNOT00000087937.1	Adra1b	ENSRNOG0000060087	adrenoceptor alpha 1B Source RGD Symbol Acc 2054
A05	SBR1115374	ENSRNOT00000028877.2	Adra1d	ENSRNOG0000021256	adrenoceptor alpha 1D Source RGD Symbol Acc 62064
A06	SBR1141749	ENSRNOT00000022813.2	Adrb1	ENSRNOG0000017002	adrenoceptor beta 1 Source RGD Symbol Acc 2059
A07	SBR1208091	ENSRNOT00000026098.3	Adrb2	ENSRNOG0000019217	adrenoceptor beta 2 Source RGD Symbol Acc 2060
A08	SBR1209022	ENSRNOT00000016907.2	Adrb3	ENSRNOG0000012674	adrenoceptor beta 3 Source RGD Symbol Acc 2061
A09	SBR1096998	ENSRNOT00000018846.6	Aebp1	ENSRNOG0000013720	AE binding protein 1 Source RGD Symbol Acc 1306922
A10	SBR1140853	ENSRNOT00000038532.3	Agtr1a	ENSRNOG0000018346	angiotensin II receptor, type 1a Source RGD Symbol Acc 2070
A11	SBR1111339	ENSRNOT00000024436.7	Anxa4	ENSRNOG0000018159	annexin A4 Source RGD Symbol Acc 621171
A12	SBR1193668	ENSRNOT00000009129.7	Ar	ENSRNOG0000005639	androgen receptor Source RGD Symbol Acc 2147
B01	SBR1095738	ENSRNOT00000001738.7	Atp2a2	ENSRNOG0000001285	ATPase sarcoplasmic/endoplasmic reticulum Ca2+ transporting 2 Source RGD Symbol Acc 2174
B02	SBR1114507	ENSRNOT00000022892.5	Atp5f1a	ENSRNOG0000017032	ATP synthase F1 subunit alpha Source RGD Symbol Acc 619993
B03	SBR1120250	ENSRNOT00000033112.4	C6	ENSRNOG0000024115	complement C6 Source RGD Symbol Acc 2238
B04	SBR1164698	ENSRNOT00000009756.5	Ccl11	ENSRNOG0000007335	C-C motif chemokine ligand 11 Source RGD Symbol Acc 3644
B05	SBR1165601	ENSRNOT00000009448.3	Ccl2	ENSRNOG0000007159	C-C motif chemokine ligand 2 Source RGD Symbol Acc 3645
B06	SBR1211432	ENSRNOT00000028411.3	Ccnd1	ENSRNOG0000020918	cyclin D1 Source RGD Symbol Acc 68384
B07	SBR1124365	ENSRNOT00000049848.1	Cdkn1b	ENSRNOG0000007249	cyclin-dependent kinase inhibitor 1B Source RGD Symbol Acc 69062
B08	SBR1137863	ENSRNOT00000068413.3	Col11a1	ENSRNOG0000023148	collagen type XI alpha 1 chain Source RGD Symbol Acc 2372
B09	SBR1132220	ENSRNOT00000005311.6	Col1a1	ENSRNOG0000003897	collagen type I alpha 1 chain Source RGD Symbol Acc 61817
B10	SBR1150486	ENSRNOT00000004956.4	Col3a1	ENSRNOG0000003357	collagen type III alpha 1 chain Source RGD Symbol Acc 71029
B11	SBR1142100	ENSRNOT00000031365.5	Creb5	ENSRNOG0000008622	cAMP responsive element binding protein 5 Source RGD Symbol Acc 1566107
B12	SBR1147022	ENSRNOT00000020160.8	Crem	ENSRNOG0000014900	cAMP responsive element modulator Source RGD Symbol Acc 2402
C01	SBR1151967	ENSRNOT00000059127.3	Cryab	ENSRNOG0000010524	crystallin, alpha B Source RGD Symbol Acc 2414
C02	SBR1115678	ENSRNOT00000088482.1	Crym	ENSRNOG00000061215	crystallin, mu Source RGD Symbol Acc 620943
C03	SBR1133606	ENSRNOT00000089196.1	Ccn2	ENSRNOG0000015036	cellular communication network factor 2 Source RGD Symbol Acc 621392
C04	SBR1209894	ENSRNOT00000066670.3	Cxcl12	ENSRNOG0000013589	C-X-C motif chemokine ligand 12 Source RGD Symbol Acc 3651
C05	SBR1126160	ENSRNOT00000006070.6	Dcn	ENSRNOG0000004554	decorin Source RGD Symbol Acc 61895
C06	SBR1107783	ENSRNOT00000035692.6	Dmd	ENSRNOG0000046366	dystrophin Source RGD Symbol Acc 2507
C07	SBR1168195	ENSRNOT00000037844.3	Dusp6	ENSRNOG0000023896	dual specificity phosphatase 6 Source RGD Symbol Acc 70978
C08	SBR1158423	ENSRNOT00000085188.1	Enah	ENSRNOG0000031934	ENAH, actin regulator Source RGD Symbol Acc 1307666
C09	SBR1160856	ENSRNOT00000017369.4	Epor	ENSRNOG0000012619	erythropoietin receptor Source RGD Symbol Acc 2560
C10	SBR1151774	ENSRNOT00000074626.2	F2r	ENSRNOG0000048043	coagulation factor II (thrombin) receptor Source RGD Symbol Acc 2586
		ENSRNOT000000		ENSRNOG00	

Position	Assay	Name	Symbol	Ensembl ID	Description
C11	SBR1178912	019772.6	Fn1	000014288	fibronectin 1 Source RGD Symbol Acc 2624
C12	SBR1121358	ENSRNOT00000 010247.5	Frzb	ENSRNOG00 000007765	frizzled-related protein Source RGD Symbol Acc 1311315
D01	SBR1168729	ENSRNOT00000 007879.4	G0s2	ENSRNOG00 000006019	G0/G1switch 2 Source RGD Symbol Acc 1311675
D02	SBR1181138	ENSRNOT00000 001054.4	Gja1	ENSRNOG00 000000805	gap junction protein, alpha 1 Source RGD Symbol Acc 2690
D03	SBR1196342	ENSRNOT00000 012853.6	Hmgcl	ENSRNOG00 000009422	3-hydroxy-3-methylglutaryl-CoA lyase Source RGD Symbol Acc 620554
D04	SBR1198292	ENSRNOT00000 022055.4	Hmgcr	ENSRNOG00 000016122	3-hydroxy-3-methylglutaryl-CoA reductase Source RGD Symbol Acc 2803
D05	SBR1103992	ENSRNOT00000 082953.1	Hmgn2	ENSRNOG00 000051615	hypothetical protein LOC100360316 Source RGD Symbol Acc 2322336
D06	SBR1210342	ENSRNOT00000 034877.6	AABR0702 6957.1	ENSRNOG00 000019533	kelch-like family member 3 Source NCBI gene Acc 498697
D07	SBR1169430	ENSRNOT00000 066674.2	Maoa	ENSRNOG00 000002848	monoamine oxidase A Source RGD Symbol Acc 61898
D08	SBR1202944	ENSRNOT00000 002533.7	Mapk1	ENSRNOG00 000001849	mitogen activated protein kinase 1 Source RGD Symbol Acc 70500
D09	SBR1144517	ENSRNOT00000 065216.3	Mapk8	ENSRNOG00 000020155	mitogen-activated protein kinase 8 Source RGD Symbol Acc 621506
D10	SBR1185175	ENSRNOT00000 011507.5	Mmp13	ENSRNOG00 000008478	matrix metalloproteinase 13 Source RGD Symbol Acc 620196
D11	SBR1133762	ENSRNOT00000 003164.8	Msi2	ENSRNOG00 000025338	musashi RNA-binding protein 2 Source RGD Symbol Acc 1560397
D12	SBR1146167	ENSRNOT00000 065895.1	Myh10	ENSRNOG00 000002886	myosin heavy chain 10 Source RGD Symbol Acc 71000
E01	SBR1107929	ENSRNOT00000 023302.2	Myh6	ENSRNOG00 000025757	myosin heavy chain 6 Source RGD Symbol Acc 62029
E02	SBR1188695	ENSRNOT00000 016051.5	Ndufb5	ENSRNOG00 000011949	NADH ubiquinone oxidoreductase subunit B5 Source RGD Symbol Acc 1305909
E03	SBR1147779	ENSRNOT00000 068553.3	Nebi	ENSRNOG00 000049452	nebulin Source RGD Symbol Acc 1308315
E04	SBR1150286	ENSRNOT00000 087089.1	Nfia	ENSRNOG00 000006966	nuclear factor I/A Source RGD Symbol Acc 3170
E05	SBR1182546	ENSRNOT00000 028155.5	Nkx2-5	ENSRNOG00 000020747	NK2 homeobox 5 Source RGD Symbol Acc 620520
E06	SBR1215239	ENSRNOT00000 011005.5	Nppa	ENSRNOG00 000008176	natriuretic peptide A Source RGD Symbol Acc 3193
E07	SBR1178119	ENSRNOT00000 010779.5	Nppb	ENSRNOG00 000008141	natriuretic peptide B Source RGD Symbol Acc 3194
E08	SBR1175096	ENSRNOT00000 020307.3	Npr1	ENSRNOG00 000014684	natriuretic peptide receptor 1 Source RGD Symbol Acc 3195
E09	SBR1112692	ENSRNOT00000 021802.5	Npr2	ENSRNOG00 000015991	natriuretic peptide receptor 2 Source RGD Symbol Acc 620851
E10	SBR1129978	ENSRNOT00000 025966.5	Npr3	ENSRNOG00 000019184	natriuretic peptide receptor 3 Source RGD Symbol Acc 3196
E11	SBR1127733	ENSRNOT00000 044287.4	AABR0703 1756.1	ENSRNOG00 000014096	nuclear receptor subfamily 3, group C, member 1 Source NCBI gene Acc 24413
E12	SBR1210771	ENSRNOT00000 052018.4	Nr3c2	ENSRNOG00 000034007	nuclear receptor subfamily 3, group C, member 2 Source RGD Symbol Acc 3094
F01	SBR1105540	ENSRNOT00000 032843.1	Pde3a	ENSRNOG00 000025042	phosphodiesterase 3A Source RGD Symbol Acc 61942
F02	SBR1185352	ENSRNOT00000 015498.4	Pde3b	ENSRNOG00 000011417	phosphodiesterase 3B Source RGD Symbol Acc 61943
F03	SBR1189939	ENSRNOT00000 019638.4	Pde5a	ENSRNOG00 000014443	phosphodiesterase 5A Source RGD Symbol Acc 620995
F04	SBR1137251	ENSRNOT00000 067725.2	Pde7a	ENSRNOG00 000013048	phosphodiesterase 7A Source RGD Symbol Acc 68391
F05	SBR1157129	ENSRNOT00000 017453.3	Postn	ENSRNOG00 000012660	perostin Source RGD Symbol Acc 1305285
F06	SBR1167990	ENSRNOT00000 016088.6	Ptn	ENSRNOG00 000011946	pleiotrophin Source RGD Symbol Acc 3444
F07	SBR1117762	ENSRNOT00000 057504.2	Rarres1	ENSRNOG00 000037853	retinoic acid receptor responder 1 Source RGD Symbol Acc 1309509
F08	SBR1215724	ENSRNOT00000 037363.4	Rassf1	ENSRNOG00 000021548	Ras association domain family member 1 Source RGD Symbol Acc 1359383
F09	SBR1199111	ENSRNOT00000 003951.4	Ren	ENSRNOG00 000002937	renin Source RGD Symbol Acc 3554
F10	SBR1197081	ENSRNOT00000 042965.3	Rtn4	ENSRNOG00 000004621	reticulon 4 Source RGD Symbol Acc 620989

Position	Assay	Name	Symbol	Ensembl ID	Description
F11	SBR1167798	ENSRNOT00000017000.4	S100a1	ENSRNOG00000012410	S100 calcium binding protein A1 Source RGD Symbol Acc 3614
F12	SBR1128955	ENSRNOT00000015473.3	S100a8	ENSRNOG00000011557	S100 calcium binding protein A8 Source RGD Symbol Acc 620265
G01	SBR1203327	ENSRNOT00000014073.5	LOC299282	ENSRNOG00000010478	Serine protease inhibitor Source RGD Symbol Acc 3745
G02	SBR1135331	ENSRNOT00000079216.1	Sfrp4	ENSRNOG00000054957	secreted frizzled-related protein 4 Source RGD Symbol Acc 621075
G03	SBR1169047	ENSRNOT00000008857.7	Slc12a1	ENSRNOG0000005367	solute carrier family 12 member 1 Source RGD Symbol Acc 3685
G04	SBR1121544	ENSRNOT00000039247.4	Snca	ENSRNOG0000008656	synuclein alpha Source RGD Symbol Acc 3729
G05	SBR1165674	ENSRNOT00000061187.3	Spock1	ENSRNOG00000012747	sparc/osteonectin, cwcv and kazal like domains proteoglycan 1 Source RGD Symbol Acc 1311496
G06	SBR1199428	ENSRNOT00000080522.1	Stat1	ENSRNOG00000014079	signal transducer and activator of transcription 4 Source RGD Symbol Acc 1305747
G07	SBR1134900	ENSRNOT00000081797.1	Tcf4	ENSRNOG00000012405	transcription factor 4 Source RGD Symbol Acc 69271
G08	SBR1212280	ENSRNOT00000014552.7	Thbs2	ENSRNOG00000010529	thrombospondin 2 Source RGD Symbol Acc 1310979
G09	SBR1096287	ENSRNOT00000024640.5	Tnni3	ENSRNOG00000018250	troponin I3, cardiac type Source RGD Symbol Acc 62052
G10	SBR1215209	ENSRNOT00000047682.5	Tnnt2	ENSRNOG00000033734	troponin T2, cardiac type Source RGD Symbol Acc 3882
G11	SBR1139956	ENSRNOT00000066885.3	Ubb	ENSRNOG00000042271	ubiquitin B Source RGD Symbol Acc 621562
G12	SBR1195346	ENSRNOT00000023537.5	Zyx	ENSRNOG00000017354	zyxin Source RGD Symbol Acc 620698
H01	SBR1220567	ENSRNOT00000042459.4	Actb	ENSRNOG00000034254	actin, beta Source RGD Symbol Acc 628837
H02	SBR1220568	ENSRNOT00000023017.5	B2m	ENSRNOG00000017123	beta-2 microglobulin Source RGD Symbol Acc 2189
H03	SBR1225377	ENSRNOT00000065935.3	Hprt1	ENSRNOG00000048561	hypoxanthine phosphoribosyltransferase 1 Source RGD Symbol Acc 2826
H04	SBR1122313	ENSRNOT00000017468.2	Ldha	ENSRNOG00000013009	lactate dehydrogenase A Source RGD Symbol Acc 2996
H05	SBR1220572	ENSRNOT00000018820.5	Rplp1	ENSRNOG00000013874	ribosomal protein lateral stalk subunit P1 Source RGD Symbol Acc 621774
H06	SBR1218555	Sybr_RGDC	RGDC	Sybr_RGDC	Rat Genomic DNA Contamination
H07	SBH1218551	Sybr_QIC	QIC	Sybr_QIC	QuantiNova Internal Control
H08	SBH1218551	Sybr_QIC	QIC	Sybr_QIC	QuantiNova Internal Control
H09	SBH1218551	Sybr_QIC	QIC	Sybr_QIC	QuantiNova Internal Control
H10	SBH1218550	Sybr_PPC	PPC	Sybr_PPC	Positive PCR Control
H11	SBH1218550	Sybr_PPC	PPC	Sybr_PPC	Positive PCR Control
H12	SBH1218550	Sybr_PPC	PPC	Sybr_PPC	Positive PCR Control

Related products

Product	Contents	Cat. no.
QuantiNova LNA PCR QC Panel	These panels are designed to assess the quality of RNA samples before characterization using QuantiNova LNA PCR Focus Panels; available in 96-well, 384-well, and Rotor-Disc 100 formats	249940
QuantiNova Reverse Transcription Kit (10)*	For 10 x 20 μ l reactions: 20 μ l 8x gDNA Removal Mix, 10 μ l Reverse Transcription Enzyme, 40 μ l Reverse Transcription Mix (containing RT primers), 20 μ l Internal Control RNA, 1.9 ml RNase-Free Water	205410
QuantiNova SYBR Green RT-PCR Kit (100)*	For 100 x 20 μ l reactions: 1 ml QuantiNova SYBR Green RT-PCR Master Mix, 20 μ l QuantiNova SYBR Green RT Mix, 20 μ l Internal Control RNA, 500 μ l Yellow Template Dilution Buffer, 250 μ l ROX Reference Dye, 1.9 μ l RNase-Free Water	208152
QuantiNova SYBR Green PCR Kit (100)*	For 100 x 20 μ l reactions: 1 ml 2x QuantiNova SYBR Green PCR Master Mix, 500 μ l QuantiNova Yellow Template Dilution Buffer, 250 μ l QN ROX Reference Dye, 1.9 ml Water	208052

*Larger kit sizes available.

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

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