

Peptide Array, Hepatitis C Virus, H77, NS4B Protein

Catalog No. NR-3754

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Product Description: The 40-peptide array spans the NS4B protein of hepatitis C virus, H77 (genotype 1a; GenPept: AAB67036). Peptides are 12- to 18-mers, with 11 or 12 amino acid overlaps.

Lot: T4944-1 to T4944-40

The following information applies to all peptides:

- Appearance White lyophilized powder
- Mass spectral analysis Correct MW by MALDI-TOF
- Counter Ion Trifluoroacetate

Peptide-specific information is shown in the two tables below.

Table 1							
Peptide	Date of Mfg.	Length	Sequence	Molecular Weight (amu)	Hydrophilicity	Purity by HPLC ^a	Peptide Content ^b
1 of 40	1/20/2011	18	1 SQHLPYIEQGMMLAEQFK 18	2150.52	-0.46	92.7%	87.2%
2 of 40	1/20/2011	18	8 EQGMMLAEQFKQKALGLL 25	2035.47	-0.04	95.7%	85.6%
3 of 40	1/20/2011	18	15 EQFKQKALGLLQTASRHA 32	2026.34	-0.66	92.6%	80.0%
4 of 40	1/20/2011	18	22 LGLLQTASRHAEVITPAV 39	1876.2	0.6	92.7%	84.6%
5 of 40	1/20/2011	18	29 SRHAEVITPAVQTNWQKL 46	2078.38	-0.56	98.8%	84.0%
6 of 40	1/20/2011	18	36 TPAVQTNWQKLEVFWAKH 53	2183.52	-0.62	93.6%	82.6%
7 of 40	1/20/2011	16	43 WQKLEVFWAKHMWNFI 58	2163.59	-0.15	93.2%	82.6%
8 of 40	1/20/2011	18	48 VFWAKHMWNFISGIQYLA 65	2211.64	0.54	95.0%	86.6%
9 of 40	1/20/2011	16	55 WNFISGIQYLAGLSTL 70	1783.07	0.79	97.7%	89.7%
10 of 40	1/20/2011	18	60 GIQYLAGLSTLPGNPAIA 77	1756.05	0.64	95.5%	89.5%
11 of 40	1/20/2011	18	67 LSTLPGNPAIASLMAFTA 84	1775.11	0.98	100.0%	90.6%
12 of 40	1/20/2011	17	74 PAIASLMAFTAAVTSP 90	1661.01	1.4	Crude	87.9%
13 of 40	1/20/2011	18	80 MAFTAAVTSP 97	1823.15	0.88	97.4%	88.9%
14 of 40	1/20/2011	18	87 TSPLTTGQTL 104	1919.23	0.46	89.7%	89.4%
15 of 40	1/20/2011	18	93 GQTL 110	1872.21	1.04	97.7%	90.1%
16 of 40	1/20/2011	18	100 ILGGV 117	1637.91	1.17	92.4%	87.8%
17 of 40	1/20/2011	18	107 AQLAAPGAATA 124	1556.8	1.22	84.3%	85.2%
18 of 40	1/20/2011	18	114 AATAFV 131	1503.73	1.61	Crude	86.8%
19 of 40	1/20/2011	18	121 AGLAGAAIGSV 138	1552.89	1.61	88.2%	87.2%
20 of 40	1/20/2011	17	128 IGSV 144	1674.03	1.39	82.9%	86.0%
21 of 40	1/20/2011	18	134 GKVLVD 151	1630.92	1.18	90.8%	87.7%
22 of 40	1/20/2011	18	141 LAGYGAGV 158	1709.1	1.52	92.2%	88.2%
23 of 40	1/20/2011	15	148 VAGALV 162	1491.83	1.47	99.6%	88.7%
24 of 40	1/20/2011	18	152 LVAFKIMSGEVP 169	1935.28	0.69	99.7%	90.5%
25 of 40	1/20/2011	18	159 SGEVPSTEDLV 176	1867.14	0.56	99.2%	89.1%

Peptide	Date of Mfg.	Length	Sequence	Molecular Weight (amu)	Hydrophilicity	Purity by HPLC ^a	Peptide Content ^b
26 of 40	1/20/2011	18	166 EDLVNLLPAILSPGALVV 183	1833.22	1.38	99.6%	88.9%
27 of 40	1/20/2011	18	173 PAILSPGALVVGVVCAAI 190	1650.07	2.13	98.9%	87.9%
28 of 40	1/20/2011	16	180 ALVVGVVCAAILRRHV 195	1676.12	1.78	98.1%	80.6%
29 of 40	1/20/2011	18	185 VVCAAILRRHVGPGEAV 202	1804.16	0.81	99.9%	81.8%
30 of 40	1/20/2011	18	192 RRHVGPGEAVQWMNRLI 209	2076.43	-0.58	98.5%	81.7%
31 of 40	1/20/2011	16	199 EGAVQWMNRLIAFASR 214	1849.16	0.06	95.2%	84.4%
32 of 40	1/20/2011	15	204 WMNRLIAFASRGNHV 218	1772.08	-0.03	99.3%	80.5%
33 of 40	1/20/2011	17	208 LIAFASRGNHVSPHYV 224	1869.13	0.18	91.2%	83.3%
34 of 40	1/20/2011	18	214 RGNHVSPHYVPESDAAA 231	1908.03	-0.82	99.9%	80.7%
35 of 40	1/20/2011	17	221 THYVPESDAAARVAIL 237	1814.04	0.24	94.7%	85.1%
36 of 40	1/20/2011	16	227 SDAAARVAILSSLTV 242	1574.81	0.99	84.5%	87.4%
37 of 40	1/20/2011	18	232 RVTAILSSLTVTQLLRRL 249	2040.5	0.72	81.0%	81.7%
38 of 40	1/20/2011	15	239 SLTVTQLLRRLHQQWI 253	1864.24	0.11	88.4%	83.3%
39 of 40	1/20/2011	18	243 TQLLRRLHQQWISSECTP 260	2169.51	-0.58	90.8%	82.6%
40 of 40	1/20/2011	12	250 HQWISSECTTPC 261	1391.56	-0.52	94.0%	86.2%

^a% full-length
^bRemainder is salt and water

Peptide		Ala (A)	Arg (R)	Asx (N,D)	Cys (C)	Glx (Q,E)	Gly (G)	His (H)	Ile (I)	Leu (L)	Lys (K)	Met (M)	Phe (F)	Pro (P)	Ser (S)	Thr (T)	Trp (W)	Tyr (Y)	Val (V)
1 of 40	Expected	1.00				5.00	1.00	1.00	1.00	2.00	1.00	2.00	1.00	1.00	1.00			1.00	
	Actual	1.00				4.80	1.15	1.05	0.80	1.70	1.00	1.68	0.93	1.01	0.80			1.05	
2 of 40	Expected	2.00				5.00	2.00			4.00	2.00	2.00	1.00						
	Actual	2.00				4.75	2.15			3.80	1.90	1.70	1.10						
3 of 40	Expected	3.00	1.00			4.00	1.00	1.00		3.00	2.00		1.00		1.00	1.00			
	Actual	2.80	0.95			3.95	1.15	1.05		3.00	1.80		1.05		0.75	0.90			
4 of 40	Expected	3.00	1.00			2.00	1.00	1.00	1.00	3.00				1.00	1.00	2.00			2.00
	Actual	2.73	0.95			1.75	1.05	1.10	0.55 ^a	2.80				1.00	0.95	1.80			1.20 ^a
5 of 40	Expected	2.00	1.00	1.00		3.00		1.00	1.00	1.00	1.00			1.00	1.00	2.00	1.00		2.00
	Actual	1.95	0.95	0.80		2.76		1.10	0.45 ^a	1.05	0.80			1.10	0.78	1.88	0.00 ^b		1.35 ^a
6 of 40	Expected	2.00		1.00		3.00		1.00		1.00	2.00		1.00	1.00		2.00	2.00		2.00
	Actual	1.85		0.95		2.88		1.00		0.95	1.75		0.89	1.10		1.78	0.00 ^b		1.80
7 of 40	Expected	1.00		1.00		2.00		1.00	1.00	1.00	2.00	1.00	2.00				3.00		1.00
	Actual	1.00		0.95		2.00		1.15	0.97	1.10	1.80	0.80	2.05				0.00 ^b		0.90
8 of 40	Expected	2.00		1.00		1.00	1.00	1.00	2.00	1.00	1.00	1.00	2.00		1.00		2.00	1.00	1.00
	Actual	1.73		0.95		0.80	1.05	1.00	1.82	0.95	0.97	0.93	1.80		0.78		0.00 ^b	1.10	0.85
9 of 40	Expected	1.00		1.00		1.00	2.00		2.00	3.00			1.00		2.00	1.00	1.00	1.00	
	Actual	1.00		0.90		0.85	2.11		1.83	2.80			0.95		1.77	0.80	0.00 ^b	1.05	
10 of 40	Expected	3.00		1.00		1.00	3.00		2.00	3.00				2.00	1.00	1.00		1.00	
	Actual	2.75		0.87		0.95	3.05		2.00	2.78				1.90	0.83	0.90		1.10	
11 of 40	Expected	4.00		1.00			1.00		1.00	3.00		1.00	1.00	2.00	2.00	2.00			
	Actual	3.76		0.90			1.06		1.10	2.90		0.80	1.10	2.10	1.93	1.87			
12 of 40	Expected	5.00							1.00	2.00		1.00	1.00	2.00	2.00	2.00			1.00
	Actual	4.85							1.00	1.89		0.85	1.10	2.00	1.78	1.70			1.00
13 of 40	Expected	3.00				1.00	1.00			3.00		1.00	1.00	1.00	1.00	5.00			1.00
	Actual	2.80				0.90	1.10			2.70		0.78	1.00	1.10	0.98	4.67			0.90
14 of 40	Expected			1.00		1.00	3.00		1.00	4.00			1.00	1.00	1.00	4.00	1.00		
	Actual			0.95		1.06	3.10		0.90	3.85			1.10	1.10	0.95	3.95	0.00 ^b		
15 of 40	Expected	3.00		1.00		2.00	3.00		1.00	4.00			1.00			1.00	1.00		1.00
	Actual	2.95		0.90		1.90	3.15		0.95	3.76			1.00			0.85	0.00 ^b		0.83

Table 2 - Amino Acid Analysis

Peptide		Ala (A)	Arg (R)	Asx (N,D)	Cys (C)	Glx (Q,E)	Gly (G)	His (H)	Ile (I)	Leu (L)	Lys (K)	Met (M)	Phe (F)	Pro (P)	Ser (S)	Thr (T)	Trp (W)	Tyr (Y)	Val (V)
16 of 40	Expected	7.00				1.00	3.00		1.00	2.00				1.00		1.00	1.00		1.00
	Actual	6.71				1.00	3.20		0.90	2.00				1.10		0.90	0.00 ^b		0.78
17 of 40	Expected	8.00				1.00	3.00			2.00			1.00	1.00		1.00			1.00
	Actual	7.65				0.90	3.15			1.90			0.90	1.10		1.00			0.75
18 of 40	Expected	7.00					4.00		1.00	1.00			1.00		1.00	1.00			2.00
	Actual	6.70					3.80		0.85	1.00			0.95		0.90	0.85			1.90
19 of 40	Expected	4.00					5.00	Expected	1.00	3.00	1.00				1.00				3.00
	Actual	3.70					5.12		1.10	2.95	0.98				1.12				2.95
20 of 40	Expected	1.00		1.00			4.00		2.00	3.00	1.00				1.00			1.00	3.00
	Actual	1.10		0.95			4.20		1.90	2.85	0.85				0.83			1.10	2.80
21 of 40	Expected	4.00		1.00			5.00		1.00	2.00	1.00							1.00	3.00
	Actual	3.80		0.95			5.10		0.95	1.80	0.90							1.10	2.80
22 of 40	Expected	5.00					4.00		1.00	2.00	1.00	1.00	1.00					1.00	2.00
	Actual	4.70					4.05		0.85	1.90	1.00	0.95	1.00					1.01	1.80
23 of 40	Expected	3.00				1.00	2.00		1.00	1.00	1.00	1.00	1.00		1.00				3.00
	Actual	2.75				0.95	2.15		0.77	0.95	0.90	0.80	1.00		0.90				2.88
24 of 40	Expected	1.00		1.00		2.00	1.00		1.00	2.00	1.00	1.00	1.00	1.00	2.00	1.00			3.00
	Actual	1.00		0.95		1.80	1.10		0.90	1.95	0.95	0.78	1.00	1.10	1.77	0.83			2.70
25 of 40	Expected	1.00		2.00		2.00	1.00		1.00	4.00				2.00	2.00	1.00			2.00
	Actual	1.00		1.75		1.85	1.10		0.90	3.65				2.00	1.80	0.77			1.90
26 of 40	Expected	2.00		2.00		1.00	1.00		1.00	5.00				2.00	1.00				3.00
	Actual	1.88		1.99		0.88	1.10		0.50	4.95				2.15	0.75				1.43 ^a
27 of 40	Expected	4.00			1.00		2.00		2.00	2.00				2.00	1.00				4.00
	Actual	3.70			0.45 ^c		2.11		1.90	2.00				2.10	0.88				1.97 ^a
28 of 40	Expected	3.00	2.00		1.00		1.00	1.00	1.00	2.00									5.00
	Actual	2.90	2.12		0.55 ^c		1.01	1.15	0.80	1.76									2.43 ^a
29 of 40	Expected	3.00	2.00		1.00	1.00	3.00	1.00	1.00	1.00				1.00					4.00
	Actual	2.70	2.00		0.45 ^c	0.95	3.10	1.15	0.80	0.95				1.10					2.67 ^a
30 of 40	Expected	1.00	3.00	1.00		2.00	3.00	1.00	1.00	1.00		1.00		1.00			1.00		2.00
	Actual	0.95	3.10	0.95		1.80	3.00	1.11	0.95	1.00		0.80		1.10			0.00 ^b		1.80
31 of 40	Expected	3.00	2.00	1.00		2.00	1.00		1.00	1.00		1.00	1.00		1.00		1.00		1.00
	Actual	2.80	2.20	0.95		1.80	1.10		0.90	0.95		0.68	1.10		0.75		0.00 ^b		0.80
32 of 40	Expected	2.00	2.00	2.00			1.00	1.00	1.00	1.00		1.00	1.00		1.00		1.00		1.00
	Actual	1.95	1.83	1.90			1.10	1.05	1.05	1.00		0.90	1.10		1.00		0.00 ^b		0.85
33 of 40	Expected	2.00	1.00	1.00			1.00	2.00	1.00	1.00			1.00	1.00	2.00	1.00		1.00	2.00
	Actual	1.80	1.00	0.73			1.10	1.80	0.90	0.85			1.05	1.00	1.88	0.82		1.10	1.90
34 of 40	Expected	3.00	1.00	2.00		1.00	1.00	2.00						2.00	2.00	1.00		1.00	2.00
	Actual	2.79	1.00	1.80		0.88	1.10	2.10						2.13	1.88	0.78		1.10	1.90
35 of 40	Expected	4.00	1.00	1.00		1.00		1.00	1.00	1.00				1.00	1.00	2.00		1.00	2.00
	Actual	4.00	1.00	1.05		1.10		0.95	0.96	0.85				1.10	1.00	2.00		0.93	1.85
36 of 40	Expected	4.00	1.00	1.00					1.00	2.00					3.00	2.00			2.00
	Actual	3.80	1.00	1.00					0.80	1.90					2.78	1.90			1.86
37 of 40	Expected	1.00	3.00			1.00			1.00	5.00					2.00	3.00			2.00
	Actual	1.12	2.88			1.13			0.85	4.90					2.10	2.90			2.00
38 of 40	Expected		2.00			2.00		1.00	1.00	4.00					1.00	2.00	1.00		1.00
	Actual		1.90			2.00		1.15	0.95	3.77					0.67	1.73	0.00 ^b		1.00
39 of 40	Expected		2.00		1.00	3.00		1.00	1.00	3.00				1.00	2.00	3.00	1.00		
	Actual		2.05		0.50 ^c	3.00		1.10	0.95	2.90				1.10	1.86	2.80	0.00 ^b		
40 of 40	Expected				2.00	2.00		1.00	1.00					1.00	2.00	2.00	1.00		
	Actual				0.86 ^c	1.93		1.05	0.95					1.10	1.85	1.78	0.00 ^b		

^aVal-Ile, Val-Val, Ile-Ile and/or Ile-Val bonds were only partially destroyed during hydrolysis

^bTrp was completely destroyed during hydrolysis

^cCys was partially destroyed during hydrolysis

Date: 27 APR 2011

Signature: *Dorothy C. Young*

Title: Technical Manager, BEI Authentication or designee

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