

Supplementary Table S12. Critical amino acid sites in positively selected sequences.

NCS	code	Positively selected sites	catalytic determinants	key residues	NMCH	code	Positively selected sites	catalytic determinants	key residues
12623A_TRINITY_DN6365_c0_g1_i4	12623A	6, 20, 35, 38, 46, 58, 60, 61, 65, 70, 79, 84, 89, 90, 97, 101, 103, 111, 140, 152	72, 84, 106,	35, 37, 38, 39, 59, 70,	12699A_TRINITY_DN10080_c0_g1_i11_p1	12699A	11, 13, 14, 19, 20, 22, 36, 37, 50, 62, 9 2, 95, 99, 101, 102, 106, 132, 147, 16 3, 184, 200, 201, 203, 215, 239, 248, 250, 257, 266, 278, 279, 282, 290, 30 7, 314, 327, 329, 332	300	NA
12748A_TRINITY_DN26148_c0_g1_	12748A	3, 11, 23, 25, 26, 29, 34, 43, 48, 53, 54, 61, 65, 67, 75, 106	35, 47, 69	2, 3, 4, 24, 33,	12779A_TRINITY_DN4525_c0_g1_i5_p1	12779A	3, 4, 7, 17, 18, 25, 26, 28, 42, 43, 56, 68 ,98, 101, 105, 110, 107, 108, 112, 140, 1 55, 171, 192, 207, 208, 210, 222, 246 ,255, 257, 264, 267, 278, 279, 282, 3 , 4, 7, 17, 18, 25, 26, 28, 42, 43, 56, 68, 9 8, 101, 105, 107, 108, 112, 140, 155, 171, 192, 207, 208, 210, 222, 246, 25 5, 257, 264, 267, 278, 279, 282, 290, 307, 314, 323, 337, 340, 344, 358, 36 0, 363, 368, 369, 371, 380, 388, 389, 395, 397, 405, 409, 413, 415, 433, 43 5, 438, 444, 458, 464, 478, 480, 482	300	435
BN01922_TR911_c0_g2_i1_p1	BN01922	19, 34, 37, 45, 57, 59, 60, 63, 68, 77, 82, 87, 88, 95, 99, 101	140, 152, 174	105, 107, 108, 109, 129, 138,	12787A_TRINITY_DN10186_c0_g1_i5_p2	12787A	11, 13, 14, 19, 20, 34, 35, 48, 60, 90, 9 3, 97, 99, 100, 104, 130, 145, 161, 18 2, 198, 199, 201, 213, 237, 246, 248, 255, 260, 273, 274, 277, 285, 287, 29 1, 299, 300, 302	NA	NA
CQ00784_TR17861_c1_g7_i1_p1	CQ00784	6, 20, 35, 38, 57, 59, 60, 64, 69, 78, 83, 88, 89, 96, 100, 102, 110, 140, 151	115, 127, 149	80, 82, 83, 84, 103, 113,	13214A_TRINITY_DN1395_c0_g2_i1_p1	13214A	14, 15, 16, 27, 29, 30, 35, 36, 38, 52, 5 3, 66, 78, 108, 111, 115, 117, 118, 12 2, 148, 163, 179, 200, 216, 217, 219, 231, 255, 264, 266, 273, 282, 294, 29 5, 298, 306, 308, 314	NA	NA
EM00204_TR863_c0_g2_i1_p1	EM00204	19, 34, 37, 45, 57, 59, 60, 63, 68, 77, 82, 87, 88, 95, 99, 101, 109, 140, 151	105, 117, 139	70, 72, 73, 74, 94, 103,	13216A_TRINITY_DN5117_c0_g1_i8_p1	13216A	10, 12, 13, 18, 19, 21, 35, 36, 49, 61, 9 1, 94, 98, 100, 101, 105, 131, 146, 16 2, 163, 199, 200, 202, 214, 238, 247, 249, 259, 271, 272, 275, 283, 285, 29 2	NA	NA
XA00077_TR556_c0_g1_i1_p1	XA00077	6, 20, 35, 38, 46, 58, 60, 61, 65 ,70, 79, 84, 89, 90, 97, 101, 10, 13, 111, 142	71, 83, 105	35, 37, 38, 39, 59, 69,	CQ00776_TR41547_c0_g1_i1_p1	CQ00776	9, 11, 12, 17, 18, 20, 32, 33, 48, 61, 91, 94, 98, 100, 101, 105, 131, 146, 162, 163, 197, 198, 200, 212, 236, 245, 24 7, 254, 256, 261, 275, 276, 279, 287, 304, 311, 320, 335, 338, 342, 356, 35 8, 361, 366, 367, 369, 378, 386, 387, 393, 395, 403, 407, 411, 430, 432, 43 3, 5, 441, 455, 461, 475, 477, 479	297	293, 432
YZ0009_TRINITY_DN82_c0_g1_i4_f	YZ0009	6, 20, 35, 38, 46, 53, 55, 56, 60 ,65, 74, 79, 84, 85, 92, 96, 98, 106, 135, 147	89, 101, 123,	55, 57, 58, 59, 87,	HRB0324B_TRINITY_DN3447_c0_g1_i3_p_	HRB0324B	8, 10, 11, 16, 17, 19, 34, 35, 48, 60, 90, 93, 97, 99, 100, 104, 130, 145, 161, 1 82, 198, 199, 201, 213, 237, 246, 248 257, 270, 271, 274, 282, 289, 293, 2 97, 308, 309, 313, 315, 317, 318, 319 ,322, 327, 333, 353, 359, 374, 376	NA	322
YZ0022_TRINITY_DN184_c0_g1_i11	YZ0022	19, 34, 37, 45, 57, 59, 60, 63, 68, 77, 82, 87, 88, 95, 99, 101, 109, 140, 152	101, 113, 135	66, 68, 69, 70, 90, 99,	XA00201_TRINITY_DN37458_c0_g1_i1_p1	XA00201	1, 2, 7, 8, 9, 10, 20, 23, 27, 29, 30, 34, 6 0, 75, 91, 112, 128, 129, 131, 143, 16 7, 176, 178, 188, 201, 202, 205, 213, 230, 237, 246, 260, 263, 267, 281, 28 3, 286, 291, 292, 294, 303, 311, 312, 318, 320, 328, 332, 336, 355, 357, 36 0, 366, 380, 386, 400, 402, 404	223	357
YZ0023_TRINITY_DN1906_c0_g1_i1	YZ0023	6, 20, 35, 38, 46, 58, 60, 61, 65, 70, 79, 84, 89, 90, 97, 101, 103, 111, 140, 152	71, 83, 105	35, 37, 38, 39, 59, 69,	YZ0117_TRINITY_DN19789_c0_g2_i1_p1	YZ0117	10, 12, 13, 18, 19, 21, 35, 36, 49, 61, 9 1, 94, 98, 100, 101, 105, 131, 146, 16 2, 163, 199, 200, 202, 214, 238, 247, 249, 259, 271, 272, 275, 283, 285, 29 5, 304, 306, 309	NA	306
CNMT	code	Positively selected sites	catalytic determinants	key residues	S-adenosylmethionone				
1303_TRINITY_DN13741_c2_g2_i4_f	00303	2, 4, 6, 20, 29, 31, 35, 38, 39, 4 9, 50, 72, 74, 92, 95, 96, 110, 1 16, 146, 154, 167, 198, 202, 2 06, 215, 251, 254, 261, 262, 2 64, 265, 268, 270, 271, 272, 2 80, 281, 283, 286, 287, 288, 2 89, 290, 292, 293, 294, 300, 3 08, 311, 312, 314, 316	198, 202, 255	75, 201	93, 131, 133, 159, 181, 182				
1897_TRINITY_DN14572_c0_g1_i1_f	07897	1, 13, 28, 37, 39, 43, 46, 47, 57 ,58, 80, 82, 100, 103, 104, 11 8, 124, 154, 162, 175, 206, 21 0, 214, 223, 259, 262, 269, 27 0, 272, 273, 276, 278, 279, 28 0, 288, 289, 291, 294, 295, 29 6, 297, 298, 300, 301, 302, 30 7, 319, 322, 323, 325, 327, 33 1, 336, 337, 338, 341, 343, 34 5, 347, 348, 349	210	83, 209, 330, 334	101, 139, 141, 163, 167, 189				
1970_TRINITY_DN49889_c1_g1_i6_f	07970	18, 107, 115, 116, 120, 124, 1 28, 129, 130, 131, 134, 136, 1 58, 167, 169, 173, 176, 177, 1 87, 188, 210, 212, 230, 233, 2 34, 248, 254, 284, 292, 305, 3 36, 340, 344, 353, 389, 392, 3 99, 400, 402, 403, 408, 408, 4 09, 410, 418, 419, 421, 424, 4 25, 426, 427, 428, 430, 431, 4 32, 437, 449, 452, 453, 455, 4 57, 461, 465, 468, 470, 473, 4 75, 477, 478, 479, 482, 484, 4 86, 488, 489, 490	340, 393	460, 461, 464	231, 269, 271, 293, 319				

3105_TRINITY_DN18453_c0_g7_i3_f	08105	1,12,15,17,35,44,46,50,53 54,64,65,87,89,107,110,11 11,125,131,161,169,182,2 13,217,221,230,266,269,2 7,155,168,199,203,207,21 6,255,255,262,263,265,26 85,288,291,292,293,295,3 03,305,308,310,315,317,3 19,320,321,324,326,328,3 30,331	213, 217, 270	90, 216, 316	107, 108, 146, 148, 170, 174, 196, 197
8514A_TRINITY_DN432_c0_g1_i2_p	08514A	21,30,32,36,39,40,50,51,7 3,75,93,96,97,111,117,14 7,155,168,199,203,207,21 6,255,255,262,263,265,26 6,269,271,272,273,274,27 5,279,286,298,300,303,30 5,307,309,310	203, 256	76, 202, 285	94, 132, 134, 156, 182
3580A_TRINITY_DN2010_c0_g1_i5_f	08580A.1	1,8,26,35,37,41,44,45,55, 56,78,80,98,101,102,116, 122,152,160,173,204,208, 212,221,246,255,256,258, 259,268,269,270,277,278, 279,281,282,283	208	81, 207	99, 137, 139, 161, 165, 187
3580A_TRINITY_DN2102_c0_g1_i1_f	08580A.2	1,8,26,35,37,41,44,45,55, 56,78,80,98,101,102,116, 122,152,160,173,204,208, 212,221,257,260,267,268, 270,271,274,275,276,278, 279,280,281,282,283,286, 1,3,24,33,35,39,42,43,53, 54,76,78,96,99,100,114,1 20,150,158,171,202,206,2 10,219,255,258,263,266,2 68,269,272,277,278,280,2 83,284,285,288,289,291,2 99,300,302,304,308,312,3	204, 208, 261	81, 207	98, 99, 137, 139, 161, 165, 187, 188
161A_TRINITY_DN20343_c1_g1_i17_f	09161A	2,4,29,38,40,44,47,48,58, 59,81,83,101,104,105,119 ,125,155,163,176,207,211 ,215,224,260,263,268,269 ,271,272,275,282,283,286 ,287,288	202, 206	79, 205	97, 135, 137, 159, 185
1681A_TRINITY_DN4804_c1_g1_i2_f	10681A	1,8,26,35,37,41,44,45,55, 56,78,80,98,101,102,116, 122,152,160,173,204,208, 212,221,246,249,250,252, 255,256,257,259	207, 211, 264	84, 210	102, 140, 142, 164, 168, 190, 191
1110A_TRINITY_DN1809_c0_g1_i4_f	11110A	1,8,26,35,37,41,44,45,55, 56,78,80,98,101,102,116, 122,152,160,173,204,208, 212,221,246,249,250,252, 255,256,257,259	208	81, 207	99, 137, 139, 161, 165, 187
1694A_TRINITY_DN3366_c0_g1_i1_f	12694A	1,7,34,43,45,49,52,53,63, 64,86,88,106,109,110,124 ,130,160,168,181,212,216 ,220,229,265,268,273,274 ,276,277,280,291,292,293 ,301,302,304,307,308,309 ,317,318,321,323,324,326 ,328,332,335,336,337,339	212, 216, 269	89, 215	107, 145, 147, 169, 173, 195, 196
699A_TRINITY_DN5057_c0_g1_i13_f	12699A	1,3,8,23,32,34,38,41,42,5 2,53,89,91,109,112,113,1 27,133,163,171,184,215,2 19,223,232,266,271,278,2 79,281,282,285,287,288,2 89,297,298,300,303,304,3 05,306,307,309,311	219	92, 218	110, 148, 150, 172, 198
779A_TRINITY_DN10409_c0_g1_i11_f	12779A	22,24,42,45,46,60,66,96,1 04,117,148,152,156,165,2 01,204,211,212,214,215,2 18,220,221,222,230,231,2 33,236,237,238,239,240,2 42,243,244,249,261,264,2 65,267,269,273,277,280,2 82,285,287,289,290,291,2 94,296,298,300,301,302,3 04	148, 152, 205	25, 151, 272, 273, 276	43, 81, 83, 105, 109, 131
803A_TRINITY_DN10277_c0_g1_i7_f	12803A.1	1,12,15,17,35,44,46,50,53 54,64,65,87,89,107,110,11 11,125,131,161,169,182,2 13,217,221,230,266,269,2 7,155,168,199,203,207,21 6,255,255,262,263,265,26 85,288,291,292,293,295,3 03,305,308,310,315,317,3 19,320,321,324,326,328,3 30,331	213, 217, 270	90, 216, 337, 338, 341	107, 108, 146, 148, 170, 174, 196
2803A_TRINITY_DN316_c0_g1_i3_p	12803A.2	1,3,8,23,32,34,38,41,42,5 2,53,89,91,109,112,113,1 27,133,163,171,184,215,2 19,223,232,261,262,265,2 66,269,273,275,278,279,2 80,281	219	92, 218	110, 148, 150, 172, 198
2926A_TRINITY_DN923_c0_g1_i6_p	12926A	1,8,26,35,37,41,44,45,55, 56,78,80,98,101,102,116, 122,152,160,173,204,208, 212,221,252,253,255,256	208	81, 207	99, 137, 139, 161, 165, 187
1960A_TRINITY_DN5868_c0_g1_i6_f	12960A	1,8,26,35,37,41,44,45,55, 56,78,80,98,101,102,116, 122,152,160,173,204,208, 212,221,252,253,255,256, 270,271,274,276,277,278	208	81, 207	99, 137, 139, 161, 165, 187
1004A_TRINITY_DN3220_c0_g1_i1_f	13004A	1,16,25,27,31,34,35,45,46 68,70,89,91,92,106,112,1 42,150,163,196,200,204,2 13,249,252,259,260,262,2 63,266,268,269,270,278,2 79,281,284,285,286,287,2 88,291,292,294,296,298	196, 200	71, 199	89, 127, 129, 151, 155, 177

1163A_TRINITY_DN7440_c0_g3_i4_f	13163A	1,8,10,14,23,24,42,44,58, 59,73,79,109,117,130,162 .166,170,179,215,218,225 .226,228,229,232,234,235 .232,234,235,237,258 263,272,281,288,289,291 293,297,301,304,306,309 .311,313,314,315,318,320 .322,324,325,326	166	45, 165	56, 94, 96, 118, 122, 144
3214A_TRINITY_DN370_c0_g1_i5_p	13214A	1,14,16,34,43,45,49,52,53 .63,64,86,88,106,109,110, 124,130,160,168,181,212, 216,220,229,265,268,275, 276,278,279,282,284,286, 287,295,296	212, 216, 269	89, 215	106, 107, 145, 147, 169, 173, 195, 196
1216A_TRINITY_DN1159_c0_g1_i7_f	13216A	1,19,28,30,34,37,38,48,49 .71,73,91,94,95,109,115,1 45,153,166,197,201,205,2 14,250,253,260,261,263,2 64,267,269,270,272,275,2 82	197, 201, 254	74, 200	92, 130, 132, 154, 158, 180, 181
CQ00776_TR40566_c0_g3_i1_p1	CQ00776	5,7,19,34,43,45,49,52,53, 63,64,86,88,106,109,110, 124,130,160,168,181,212, 216,220,229,265,268,275, 276,278,279,282,284,285, 286,294,295,297,300,301, 302,303,304,306,307,308, 313,325,328,329,331,333, 337,341,344,346,349,351, 353,354,355,358,360,362, 364,365,366	216	89, 215, 336, 340	107, 145, 147, 169, 173, 195
30324B_TRINITY_DN3288_c0_g1_i5	HRB0324B	6,25,34,36,40,43,44,54,55 .77,79,97,100,101,115,12 1,151,159,172,203,207,21 1,220,256,259,266,267,26 9,270,273,276,277,278	207	80, 206	98, 136, 138, 160, 186
XA00077_TR53730_c0_g6_i1_p1	XA00077	7,13,15,19,37,46,48,52,55 .56,66,67,81,93,111,114,1 15,129,135,165,173,186,2 17,221,225,234,270,273,2 80,281,283,284,287,289,2 90,291,299,300,302,305,3 06,307,308,309,311,312,3 13,318,330,333,334,336,3 38,342,346,349,351,354,3 56,358,359,360,363,365,3 67,369,370,371	217, 221, 274	94, 220, 341, 342	112, 152, 178, 200, 201
.00290_TRINITY_DN3556_c0_g1_i2_	XA00290	1,4,8,12,13,14,15,18,20,4 5,54,56,60,63,64,74,75,97 .99,117,120,121,135,141, 171,179,192,223,227,231, 240,276,279,284,285,287, 288,291,293,294,295,303, 304,306,309,310,311,312, 313,315,316,317,322,334, 336,337,339,341,345,349, 352,354,357,359,361,362, 363,366,368,370,372,373, 374	223, 227, 280	100, 226, 344, 345, 348	118, 156, 158, 180, 184, 206, 207
Z0009_TRINITY_DN4056_c0_g1_i4_f	YZ0009	2,5,12,30,39,41,45,48,49, 59,60,82,84,102,105,106, 120,126,156,164,177,208, 212,216,225,261,264,271, 272,274,275,278,280,281, 282,290,291,293,296,297, 298,299,300,302,303,304, 309,321,324,325,327,330, 332	208, 212, 265	85, 211	102, 103, 141, 143, 165, 169, 191, 192
3016_TRINITY_DN12195_c0_g1_i10_	YZ0016.1	2,27,36,38,42,45,46,52,53 .75,77,95,98,99,113,119,1 49,157,170,201,205,209,2 18,244,245,247,250,251,2 52,253,254,256,257,258	201, 205	78, 204	96, 134, 136, 158, 162, 184, 185
.0016_TRINITY_DN12195_c0_g2_i5_	YZ0016.2	2,27,36,38,42,45,46,52,53 .75,77,95,98,99,113,119,1 49,157,170,201,205,209,2 18,254,257,262,263,265,2 66,269,271,272,273,281,2 82,284,287,288,289,290,2 91,293,294,295,300,312,3 14,315,317,319,323,327,3 30,332,335,337,339,340,3 41,344,346,348,350,351,3 52	201, 205, 258	78, 204, 322, 323, 326	96, 134, 136, 158, 162, 184, 185
.0027_TRINITY_DN9370_c0_g1_i12_	YZ0027	1,8,26,35,37,41,44,45,55, 56,78,80,98,101,102,116, 122,152,160,173,204,208, 212,221,257,260,267,268, 270,271,274,275,276,278, 279,281,284,286,288,289, 290,292,294	204, 208, 261	81, 207	98, 99, 137, 139, 161, 165, 187, 188
.0046_TRINITY_DN11956_c0_g1_i4_	YZ0046	2,8,10,28,37,39,43,46,47, 57,58,80,82,100,103,104, 118,124,154,162,175,206, 210,214,223,259,262,269, 270,272,273,276,278,279, 280,289,291,291,294,295, 296,297,298,299,301,302, 303,308,315,318,320,322, 324,325,326,328,332	206, 210, 263	83, 209	100, 101, 139, 141, 163, 167, 189, 190

0066_TRINITY_DN34903_c2_g1_i1_	YZ0066	1,3,28,37,39,43,46,47,57, 58,80,82,100,103,104,118 .124,154,162,175,206,210 .214,223,259,262,267,268 .270,271,274,276,277,278 .286,287,289,292,293,294 .299,300,302,303,305,307 .311,315,318,320	206, 210, 263	83, 209, 310, 314	101, 139, 141, 163, 167, 189, 190
Z0068_TRINITY_DN4085_c0_g1_i7_f	YZ0068	1,8,26,35,37,41,44,45,55, 56,78,80,98,101,102,116, 122,152,160,173,204,208, 212,221,246,248,249	204, 208	81, 207	98, 99, 137, 139, 161, 165, 187, 188
Z0094_TRINITY_DN4238_c0_g1_i9_f	YZ0094	1,3,28,37,39,43,46,47,57, 58,80,82,100,103,104,118 .124,154,162,175,206,210 .214,223,248,249,251,252 .255,256,257,259,262,263 .264,276,277,282,293,295 .297,304,307,309,311,313 .314,316,318,320,321,322 .324	206, 210	83, 209, 300	101, 139, 141, 163, 167, 189, 190
Z0097_TRINITY_DN3580_c1_g1_i36_	YZ0097.2	1,8,26,35,37,41,44,45,55, 56,78,80,98,101,102,116, 122,152,160,173,204	NA	81, 207	99, 137, 139, 161, 165, 187
Z0097_TRINITY_DN5075_c3_g3_i3_f	YZ0097.1	1,26,28,32,35,36,50,52,88 .96,109,140,144,148,157, 193,196,201,202,204,205, 208,210,211,212,220,221, 223,235,227,239,229,230, 232,233,234,239,251,253, 254,256,258,262,266,269, 271,274,276,278,279,280, 283,285,287,289,290,291	140, 144, 197	143, 261, 262, 265	73, 75, 97, 101, 123, 124
Z0117_TRINITY_DN7598_c0_g1_i4_f	YZ0117	12,14,32,35,36,50,56,86,9 4,107,138,142,146,155,19 1,194,201,202,204,205,20 8,209,210	138, 142, 195	15, 141	32, 33, 71, 73, 95, 99, 121, 122

OMT	code	Positively selected sites	catalytic determinants	key residues	S-adenosylmethionone
Z210_TRINITY_DN13681_c0_g1_i1_f	00210	1,3,4,7,8,17,19,45,61,62,8 7,92,113,117,138,146,167 .221,234,254	NA	170	196, 219, 239, 253
Z205_TRINITY_DN10798_c0_g1_i3_f	01205.2	1,3,11,20,22,48,89,114,11 8,139,147,169,222,235,25 5,257,258	NA	167	172, 197, 220, 240, 254
Z1205_TRINITY_DN4606_c0_g1_i1_p	01205.1	2,4,30,75,101,105,133,15 4,208,221,241,243,244,24 5,248,251,254,255,258,26 1,266,268,287,292,297,30 1,302,305,306,318,328,33 5,338	244, 304	NA	183, 206, 226, 240
Z985_TRINITY_DN16834_c0_g1_i1_f	07985.1	1,11,13,39,78,105,109,13 7,158,212,225,245,247,24 8,249,252,255,258,259	248, 249	157	187, 210, 230, 244
Z985_TRINITY_DN16834_c1_g1_i1_f	07985.2	2,3,4,7,10,11,12,13,15,24, 26,52,92,97,118,122,141, 149,170,226,239,259,261, 266,267,270,271,274	266	NA	174, 201, 224, 244, 258
Z1580A_TRINITY_DN7291_c0_g1_i1_f	08580A	1,3,10,19,21,47,87,93,114 .118,146,167,221,234,254 .257,259		166	17, 196, 219, 239, 253
Z895A_TRINITY_DN38724_c0_g1_i1_	08895A	26,28,29,30,32,34,38,39,4 0,43,47,48,49,50,52,54,64 .73,75,101,142,163,167,1 87,210,266,279,301,304,3 07,308,311,319,322,325	NA	NA	214, 241, 264, 284, 298
Z126A_TRINITY_DN24828_c0_g1_i12_	11326A	1,3,4,6,7,16,18,44,90,111, 115,133,135,143,216,229, 249,251	NA	163	191, 214, 234, 248
Z1539A_TRINITY_DN9861_c0_g1_i7_f	11539A	1,5,6,7,10,14,15,24,26,52, 97,118,122,143,145,153,1 74,228,241,261,263,264,2 65,268,271,274,275,278,2 81,286,288,307,312,317,3 20,321,324,325,338,348,3 55,358	264, 265, 323	173, 314	203, 226, 246, 260
Z597A_TRINITY_DN17726_c0_g1_i6_	12597A	19,32,60,86,90,118,139,1 92,205,225,227,229,229,2 32,235,238,239,242,245,2 50,252,259,265,289,295	228, 229	NA	167, 190, 210, 224
Z699A_TRINITY_DN2015_c0_g1_i4_f	12699A	1,3,6,7,14,24,26,49,94,98, 122,128,147,155,176,195, 229,242,262,264,265,266, 269,272,275,276,279,282, 286,288,309,314,319,323, 324,327,328,340,350,357, 360	265, 266, 326	NA	204, 227, 247, 261
Z745A_TRINITY_DN494_c0_g2_i19_f	12745A	22,24,25,26,28,30,34,35,3 6,39,43,44,45,46,48,50,55 .56,57,66,68,94,134,140,1 61,165,186,194,223,277,2 90,310,315,324,333,336	NA	222	227, 252, 275, 295, 309
Z748A_TRINITY_DN9185_c0_g1_i8_f	12748A	9,13,14,15,16,18,25,34,36 .62,102,108,129,133,161, 182,240,250,252,267	NA	181	186
Z919A_TRINITY_DN6149_c0_g1_i6_f	12919A	1,3,4,5,15,17,43,56,84,11 0,114,143,164,217,230,24 9,254,259,264,267,268,27 1,272	NA	NA	192, 215, 235

1016A_TRINITY_DN5821_c0_g1_i1_f	13016A	12,14,15,16,18,20,24,25,2 6,29,33,34,35,42,43,53,55 81,120,147,151,179,200, 254,267,288,289,291,301, 305,315	289	199	229, 252, 272, 286
162A_TRINITY_DN100460_c0_g1_i1	13062A	1,3,5,6,15,17,43,88,109,1 13,134,142,163,217,230,2 66	NA	166	167, 192, 215, 235, 249
1134A_TRINITY_DN6731_c0_g1_i2_f	13134A	1,2,11,13,39,84,105,109,1 30,132,140,161,215,228,2 52,255	NA	160	190, 213, 233, 247
3140A_TRINITY_DN362_c3_g1_i6_p	13140A	2,3,12,14,40,85,106,110,1 30,132,140,161,215,228,2 48,250,253	NA	164	190, 213, 233, 247
143A_TRINITY_DN13563_c0_g1_i1	13143A	3,4,5,8,9,11,13,14,23,25,5 1,96,117,121,142,150,171 225,238,258,260,261,262 265,268,271,272,275,278 283,285,304,309,314,317 320,321,333,343,350,353	261, 262, 319	174, 258	175, 200, 223, 243, 257
1214A_TRINITY_DN6374_c0_g1_i2_f	13214A	1,3,6,7,16,18,44,86,90,11 1,115,143,164,218,231,25 1,252,255,258	NA	167	168, 193, 216, 236, 250
BN01422_TR69425_c0_g1_i1_p1	BN01422	3,4,6,8,12,13,14,17,21,22 23,24,26,27,30,31,40,42, 68,83,108,114,135,139,16 1,169,190,244,257,277,27 9,280,281,284,287,290,29 1,294,297,302,304,323,32 8,333,336,337,340,341,35 3,363,370,373	280, 281, 339	193, 277, 330	194, 219, 242, 262, 276
0494A_TRINITY_DN16790_c3_g4_i4	CC00494A	2,3,12,14,40,85,106,110,1 30,132,140,161,215,228,2 48,250,251,252,253,261,2 66,269	252	164	165, 190, 213, 233, 247
CQ00790_TR11836_c1_g5_i3_p1	CQ00790	11,15,33,89,102,122,124, 125,126,129,132,135,136, 139,142,147,149,168,173, 178,180,181,184,185,197, 207,214,217	125, 183	NA	64, 87, 107, 121
100104_TRINITY_DN6939_c0_g1_i1	EM00104	1,3,5,8,9,18,20,46,61,62,8 9,94,115,119,142,144,152 173,227,240,260,262,263 264	NA	176	177, 202, 225, 245, 259
10111B_TRINITY_DN18121_c0_g1_i1	HRB0111B	1,3,12,14,40,80,85,106,11 0,129,137,150,214,227,24 7,249,253,254,257,260,26 2	253	NA	162, 189, 212, 232, 246
30111B_TRINITY_DN2738_c0_g1_i4	HRB0111B	1,3,10,19,21,47,88,113,11 27,138,146,167,221,234,27 2,277,282,285,287	NA	166	171, 196, 219, 239, 253
XA00077_TR27717_c0_g2_i7_p2	XA00077	1,3,7,8,18,20,46,91,112,1 16,137,138,146,167,221,2 54,255	253	170	171, 196, 219
10011_TRINITY_DN64337_c0_g1_i1	YZ0011	1,10,12,38,78,84,105,109, 137,158,212,225,247,248, 251	NA	157	162, 187, 210, 230, 244
20027_TRINITY_DN5602_c0_g1_i2_f	YZ0027	1,3,5,6,15,17,43,88,109,1 13,132,134,142,163,217,2 30,250,252,255,256,259,2 62,274	NA	166	192, 215, 235, 249
20049_TRINITY_DN8550_c0_g2_i5_f	YZ0049	6,7,8,11,15,16,17,18,20,2 2,23,32,34,60,103,108,12 9,133,154,162,183,237,25 0,270,272,273,274	NA	186	187, 212, 235, 255, 269
10063_TRINITY_DN12421_c0_g1_i2	YZ0063	2,3,12,14,40,85,106,110,1 37,158,212,225,249,251,2 66	NA	161	162, 187, 210, 230, 244
20079_TRINITY_DN2556_c0_g1_i2_f	YZ0079	1,3,5,6,15,17,43,83,88,10 9,113,141,162,217,230,25 0,252,253,254,257	NA	165	166, 192, 215, 235, 249