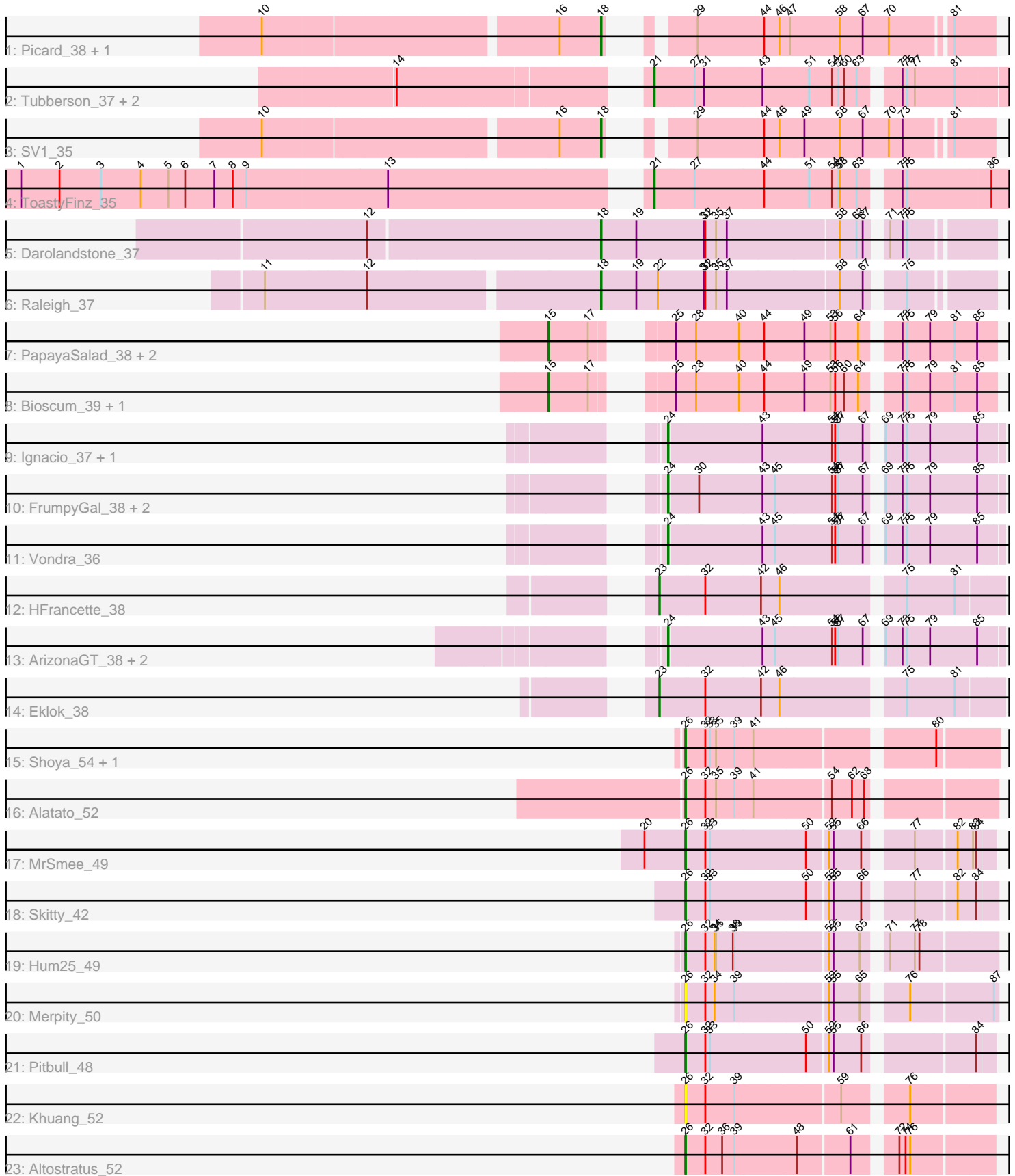


Pham 292981



Note: Tracks are now grouped by subcluster and scaled. Switching in subcluster is indicated by changes in track color. Track scale is now set by default to display the region 30 bp upstream of start 1 to 30 bp downstream of the last possible start. If this default region is judged to be packed too tightly with annotated starts, the track will be further scaled to only show that region of the ORF with annotated starts. This action will be indicated by adding "Zoomed" to the title. For starts, yellow indicates the location of called starts comprised solely of Glimmer/GeneMark auto-annotations, green indicates the location of called starts with at least 1 manual gene annotation.

Pham 292981 Report

This analysis was run 04/18/26 on database version 643.

WARNING: Pham size does not match number of genes in report. Either unphamerated genes have been added (by you) or starterator has removed genes due to invalid start codon.

Pham number 292981 has 35 members, 4 are drafts.

Phages represented in each track:

- Track 1 : Picard_38, Mojarita_38
- Track 2 : Tubberson_37, SoJo_37, DaRealMyers_37
- Track 3 : SV1_35
- Track 4 : ToastyFinz_35
- Track 5 : Darolandstone_37
- Track 6 : Raleigh_37
- Track 7 : PapayaSalad_38, Lishka_35, Austintatious_35
- Track 8 : Bioscum_39, Ididsumtinwong_39
- Track 9 : Ignacio_37, AxeJC_37
- Track 10 : FrumpyGal_38, Eastland_37, Piccadilly_37
- Track 11 : Vondra_36
- Track 12 : HFrancette_38
- Track 13 : ArizonaGT_38, Cumberbatch_38, Schlegelian_39
- Track 14 : Eklok_38
- Track 15 : Shoya_54, Gibbzilla_61
- Track 16 : Alatato_52
- Track 17 : MrSmee_49
- Track 18 : Skitty_42
- Track 19 : Hum25_49
- Track 20 : Merpity_50
- Track 21 : Pitbull_48
- Track 22 : Khuang_52
- Track 23 : Altostratus_52

Summary of Final Annotations (See graph section above for start numbers):

The start number called the most often in the published annotations is 24, it was called in 9 of the 31 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- ArizonaGT_38, AxeJC_37, Cumberbatch_38, Eastland_37, FrumpyGal_38, Ignacio_37, Piccadilly_37, Schlegelian_39, Vondra_36,

Genes that have the "Most Annotated" start but do not call it:

-

Genes that do not have the "Most Annotated" start:

- Alatato_52, Altostratus_52, Austintatious_35, Bioscum_39, DaRealMyers_37, Darolandstone_37, Eklok_38, Gibbzilla_61, HFrancette_38, Hum25_49, Ididsumtinwong_39, Khuang_52, Lishka_35, Merpity_50, Mojorita_38, MrSmee_49, PapayaSalad_38, Picard_38, Pitbull_48, Raleigh_37, SV1_35, Shoya_54, Skitty_42, SoJo_37, ToastyFinz_35, Tubberson_37,

Summary by start number:

Start 15:

- Found in 5 of 35 (14.3%) of genes in pham
- Manual Annotations of this start: 5 of 31
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Austintatious_35 (BC3), Bioscum_39 (BC3), Ididsumtinwong_39 (BC3), Lishka_35 (BC3), PapayaSalad_38 (BC3),

Start 18:

- Found in 5 of 35 (14.3%) of genes in pham
- Manual Annotations of this start: 5 of 31
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Darolandstone_37 (BC2), Mojorita_38 (BC1), Picard_38 (BC1), Raleigh_37 (BC2), SV1_35 (BC1),

Start 21:

- Found in 4 of 35 (11.4%) of genes in pham
- Manual Annotations of this start: 3 of 31
- Called 100.0% of time when present
- Phage (with cluster) where this start called: DaRealMyers_37 (BC1), SoJo_37 (BC1), ToastyFinz_35 (BC1), Tubberson_37 (BC1),

Start 23:

- Found in 2 of 35 (5.7%) of genes in pham
- Manual Annotations of this start: 2 of 31
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Eklok_38 (BP), HFrancette_38 (BP),

Start 24:

- Found in 9 of 35 (25.7%) of genes in pham
- Manual Annotations of this start: 9 of 31
- Called 100.0% of time when present
- Phage (with cluster) where this start called: ArizonaGT_38 (BP), AxeJC_37 (BP), Cumberbatch_38 (BP), Eastland_37 (BP), FrumpyGal_38 (BP), Ignacio_37 (BP), Piccadilly_37 (BP), Schlegelian_39 (BP), Vondra_36 (BP),

Start 26:

- Found in 10 of 35 (28.6%) of genes in pham
- Manual Annotations of this start: 7 of 31

- Called 100.0% of time when present
- Phage (with cluster) where this start called: Alatato_52 (FB), Altostratus_52 (FS), Gibbzilla_61 (FB), Hum25_49 (FQ), Khuang_52 (FS), Merpity_50 (FQ), MrSmee_49 (FQ), Pitbull_48 (FQ), Shoya_54 (FB), Skitty_42 (FQ),

Summary by clusters:

There are 7 clusters represented in this pham: FQ, FS, FB, BP, BC1, BC2, BC3,

Info for manual annotations of cluster BC1:

- Start number 18 was manually annotated 3 times for cluster BC1.
- Start number 21 was manually annotated 3 times for cluster BC1.

Info for manual annotations of cluster BC2:

- Start number 18 was manually annotated 2 times for cluster BC2.

Info for manual annotations of cluster BC3:

- Start number 15 was manually annotated 5 times for cluster BC3.

Info for manual annotations of cluster BP:

- Start number 23 was manually annotated 2 times for cluster BP.
- Start number 24 was manually annotated 9 times for cluster BP.

Info for manual annotations of cluster FB:

- Start number 26 was manually annotated 2 times for cluster FB.

Info for manual annotations of cluster FQ:

- Start number 26 was manually annotated 4 times for cluster FQ.

Info for manual annotations of cluster FS:

- Start number 26 was manually annotated 1 time for cluster FS.

Gene Information:

Gene: Alatato_52 Start: 30671, Stop: 31222, Start Num: 26

Candidate Starts for Alatato_52:

(Start: 26 @30671 has 7 MA's), (32, 30710), (35, 30731), (39, 30767), (41, 30803), (54, 30941), (62, 30980), (68, 31004),

Gene: Altostratus_52 Start: 30510, Stop: 31055, Start Num: 26

Candidate Starts for Altostratus_52:

(Start: 26 @30510 has 7 MA's), (32, 30549), (36, 30582), (39, 30606), (48, 30723), (61, 30816), (72, 30882), (74, 30894), (76, 30903),

Gene: ArizonaGT_38 Start: 26274, Stop: 26873, Start Num: 24

Candidate Starts for ArizonaGT_38:

(Start: 24 @26274 has 9 MA's), (43, 26442), (45, 26463), (54, 26574), (56, 26580), (57, 26586), (67, 26634), (69, 26649), (73, 26682), (75, 26691), (79, 26736), (85, 26826),

Gene: Austintatious_35 Start: 24116, Stop: 24850, Start Num: 15

Candidate Starts for Austintatious_35:

(Start: 15 @24116 has 5 MA's), (17, 24185), (25, 24269), (28, 24302), (40, 24383), (44, 24431), (49, 24506), (53, 24557), (56, 24566), (64, 24611), (73, 24668), (75, 24677), (79, 24722), (81, 24770), (85, 24812),

Gene: AxeJC_37 Start: 26248, Stop: 26847, Start Num: 24

Candidate Starts for AxeJC_37:

(Start: 24 @26248 has 9 MA's), (43, 26416), (54, 26548), (56, 26554), (57, 26560), (67, 26608), (69, 26623), (73, 26656), (75, 26665), (79, 26710), (85, 26800),

Gene: Bioscum_39 Start: 26417, Stop: 27151, Start Num: 15

Candidate Starts for Bioscum_39:

(Start: 15 @26417 has 5 MA's), (17, 26486), (25, 26570), (28, 26603), (40, 26684), (44, 26732), (49, 26807), (53, 26858), (56, 26867), (60, 26885), (64, 26912), (73, 26969), (75, 26978), (79, 27023), (81, 27071), (85, 27113),

Gene: Cumberbatch_38 Start: 26274, Stop: 26873, Start Num: 24

Candidate Starts for Cumberbatch_38:

(Start: 24 @26274 has 9 MA's), (43, 26442), (45, 26463), (54, 26574), (56, 26580), (57, 26586), (67, 26634), (69, 26649), (73, 26682), (75, 26691), (79, 26736), (85, 26826),

Gene: DaRealMyers_37 Start: 28133, Stop: 28774, Start Num: 21

Candidate Starts for DaRealMyers_37:

(14, 27719), (Start: 21 @28133 has 3 MA's), (27, 28208), (31, 28223), (43, 28337), (51, 28424), (54, 28469), (57, 28481), (60, 28493), (63, 28517), (73, 28577), (75, 28586), (77, 28601), (81, 28679),

Gene: Darolandstone_37 Start: 28052, Stop: 28756, Start Num: 18

Candidate Starts for Darolandstone_37:

(12, 27611), (Start: 18 @28052 has 5 MA's), (19, 28121), (31, 28253), (32, 28256), (35, 28277), (37, 28298), (58, 28505), (63, 28538), (67, 28550), (71, 28574), (73, 28598), (75, 28607),

Gene: Eastland_37 Start: 26233, Stop: 26832, Start Num: 24

Candidate Starts for Eastland_37:

(Start: 24 @26233 has 9 MA's), (30, 26281), (43, 26401), (45, 26422), (54, 26533), (56, 26539), (57, 26545), (67, 26593), (69, 26608), (73, 26641), (75, 26650), (79, 26695), (85, 26785),

Gene: Eklok_38 Start: 26293, Stop: 26928, Start Num: 23

Candidate Starts for Eklok_38:

(Start: 23 @26293 has 2 MA's), (32, 26380), (42, 26488), (46, 26524), (75, 26743), (81, 26836),

Gene: FrumpyGal_38 Start: 26233, Stop: 26832, Start Num: 24

Candidate Starts for FrumpyGal_38:

(Start: 24 @26233 has 9 MA's), (30, 26281), (43, 26401), (45, 26422), (54, 26533), (56, 26539), (57, 26545), (67, 26593), (69, 26608), (73, 26641), (75, 26650), (79, 26695), (85, 26785),

Gene: Gibbzilla_61 Start: 32014, Stop: 32568, Start Num: 26

Candidate Starts for Gibbzilla_61:

(Start: 26 @32014 has 7 MA's), (32, 32053), (33, 32062), (35, 32074), (39, 32110), (41, 32146), (80, 32455),

Gene: HFrancette_38 Start: 26977, Stop: 27612, Start Num: 23

Candidate Starts for HFrancette_38:

(Start: 23 @26977 has 2 MA's), (32, 27064), (42, 27172), (46, 27208), (75, 27427), (81, 27520),

Gene: Hum25_49 Start: 28897, Stop: 29445, Start Num: 26

Candidate Starts for Hum25_49:

(Start: 26 @28897 has 7 MA's), (32, 28933), (34, 28951), (35, 28954), (38, 28987), (39, 28990), (52, 29158), (55, 29167), (65, 29218), (71, 29248), (77, 29296), (78, 29305),

Gene: Ididsumtinwong_39 Start: 26417, Stop: 27151, Start Num: 15

Candidate Starts for Ididsumtinwong_39:

(Start: 15 @26417 has 5 MA's), (17, 26486), (25, 26570), (28, 26603), (40, 26684), (44, 26732), (49, 26807), (53, 26858), (56, 26867), (60, 26885), (64, 26912), (73, 26969), (75, 26978), (79, 27023), (81, 27071), (85, 27113),

Gene: Ignacio_37 Start: 26926, Stop: 27525, Start Num: 24

Candidate Starts for Ignacio_37:

(Start: 24 @26926 has 9 MA's), (43, 27094), (54, 27226), (56, 27232), (57, 27238), (67, 27286), (69, 27301), (73, 27334), (75, 27343), (79, 27388), (85, 27478),

Gene: Khuang_52 Start: 30706, Stop: 31251, Start Num: 26

Candidate Starts for Khuang_52:

(Start: 26 @30706 has 7 MA's), (32, 30745), (39, 30802), (59, 30994), (76, 31099),

Gene: Lishka_35 Start: 24116, Stop: 24850, Start Num: 15

Candidate Starts for Lishka_35:

(Start: 15 @24116 has 5 MA's), (17, 24185), (25, 24269), (28, 24302), (40, 24383), (44, 24431), (49, 24506), (53, 24557), (56, 24566), (64, 24611), (73, 24668), (75, 24677), (79, 24722), (81, 24770), (85, 24812),

Gene: Merpity_50 Start: 29915, Stop: 30463, Start Num: 26

Candidate Starts for Merpity_50:

(Start: 26 @29915 has 7 MA's), (32, 29951), (34, 29969), (39, 30008), (52, 30176), (55, 30185), (65, 30236), (76, 30305), (87, 30455),

Gene: Mojerita_38 Start: 27040, Stop: 27669, Start Num: 18

Candidate Starts for Mojerita_38:

(10, 26422), (16, 26959), (Start: 18 @27040 has 5 MA's), (29, 27121), (44, 27250), (46, 27277), (47, 27298), (58, 27391), (67, 27436), (70, 27487), (81, 27595),

Gene: MrSmee_49 Start: 30095, Stop: 30640, Start Num: 26

Candidate Starts for MrSmee_49:

(20, 30017), (Start: 26 @30095 has 7 MA's), (32, 30131), (33, 30140), (50, 30323), (52, 30359), (55, 30368), (66, 30422), (77, 30497), (82, 30572), (83, 30602), (84, 30608),

Gene: PapayaSalad_38 Start: 26702, Stop: 27436, Start Num: 15

Candidate Starts for PapayaSalad_38:

(Start: 15 @26702 has 5 MA's), (17, 26771), (25, 26855), (28, 26888), (40, 26969), (44, 27017), (49, 27092), (53, 27143), (56, 27152), (64, 27197), (73, 27254), (75, 27263), (79, 27308), (81, 27356), (85, 27398),

Gene: Picard_38 Start: 27238, Stop: 27867, Start Num: 18

Candidate Starts for Picard_38:

(10, 26620), (16, 27157), (Start: 18 @27238 has 5 MA's), (29, 27319), (44, 27448), (46, 27475), (47, 27496), (58, 27589), (67, 27634), (70, 27685), (81, 27793),

Gene: Piccadilly_37 Start: 26232, Stop: 26831, Start Num: 24

Candidate Starts for Piccadilly_37:

(Start: 24 @26232 has 9 MA's), (30, 26280), (43, 26400), (45, 26421), (54, 26532), (56, 26538), (57, 26544), (67, 26592), (69, 26607), (73, 26640), (75, 26649), (79, 26694), (85, 26784),

Gene: Pitbull_48 Start: 28431, Stop: 28976, Start Num: 26

Candidate Starts for Pitbull_48:

(Start: 26 @28431 has 7 MA's), (32, 28467), (33, 28476), (50, 28659), (52, 28695), (55, 28704), (66, 28758), (84, 28944),

Gene: Raleigh_37 Start: 28558, Stop: 29259, Start Num: 18

Candidate Starts for Raleigh_37:

(11, 27940), (12, 28132), (Start: 18 @28558 has 5 MA's), (19, 28627), (22, 28666), (31, 28756), (32, 28759), (35, 28780), (37, 28801), (58, 29008), (67, 29053), (75, 29110),

Gene: SV1_35 Start: 25947, Stop: 26576, Start Num: 18

Candidate Starts for SV1_35:

(10, 25329), (16, 25866), (Start: 18 @25947 has 5 MA's), (29, 26028), (44, 26157), (46, 26184), (49, 26232), (58, 26298), (67, 26343), (70, 26394), (73, 26421), (81, 26502),

Gene: Schlegelian_39 Start: 26642, Stop: 27241, Start Num: 24

Candidate Starts for Schlegelian_39:

(Start: 24 @26642 has 9 MA's), (43, 26810), (45, 26831), (54, 26942), (56, 26948), (57, 26954), (67, 27002), (69, 27017), (73, 27050), (75, 27059), (79, 27104), (85, 27194),

Gene: Shoya_54 Start: 30638, Stop: 31192, Start Num: 26

Candidate Starts for Shoya_54:

(Start: 26 @30638 has 7 MA's), (32, 30677), (33, 30686), (35, 30698), (39, 30734), (41, 30770), (80, 31079),

Gene: Skitty_42 Start: 27777, Stop: 28328, Start Num: 26

Candidate Starts for Skitty_42:

(Start: 26 @27777 has 7 MA's), (32, 27813), (33, 27822), (50, 28005), (52, 28041), (55, 28050), (66, 28104), (77, 28179), (82, 28254), (84, 28290),

Gene: SoJo_37 Start: 28128, Stop: 28769, Start Num: 21

Candidate Starts for SoJo_37:

(14, 27714), (Start: 21 @28128 has 3 MA's), (27, 28203), (31, 28218), (43, 28332), (51, 28419), (54, 28464), (57, 28476), (60, 28488), (63, 28512), (73, 28572), (75, 28581), (77, 28596), (81, 28674),

Gene: ToastyFinz_35 Start: 28209, Stop: 28868, Start Num: 21

Candidate Starts for ToastyFinz_35:

(1, 27051), (2, 27126), (3, 27207), (4, 27285), (5, 27339), (6, 27372), (7, 27429), (8, 27465), (9, 27492), (13, 27765), (Start: 21 @28209 has 3 MA's), (27, 28284), (44, 28416), (51, 28500), (54, 28545), (57, 28557), (58, 28560), (63, 28593), (73, 28653), (75, 28662), (86, 28821),

Gene: Tubberson_37 Start: 28130, Stop: 28771, Start Num: 21

Candidate Starts for Tubberson_37:

(14, 27716), (Start: 21 @28130 has 3 MA's), (27, 28205), (31, 28220), (43, 28334), (51, 28421), (54, 28466), (57, 28478), (60, 28490), (63, 28514), (73, 28574), (75, 28583), (77, 28598), (81, 28676),

Gene: Vondra_36 Start: 26093, Stop: 26692, Start Num: 24

Candidate Starts for Vondra_36:

(Start: 24 @26093 has 9 MA's), (43, 26261), (45, 26282), (54, 26393), (56, 26399), (57, 26405), (67, 26453), (69, 26468), (73, 26501), (75, 26510), (79, 26555), (85, 26645),