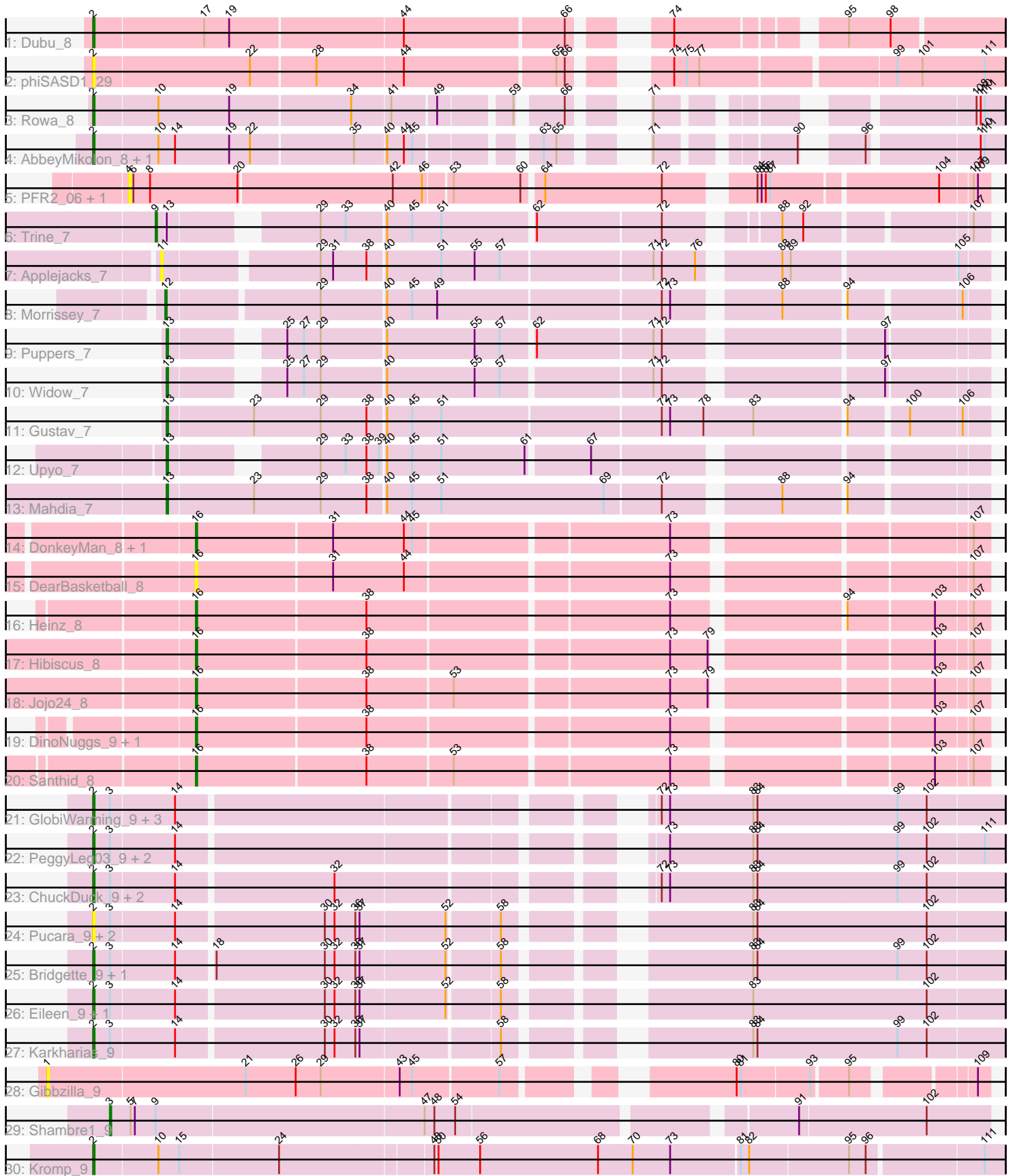


Pham 311745



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 311745 Report

This analysis was run 06/27/26 on database version 652.

Pham number 311745 has 45 members, 12 are drafts.

Phages represented in each track:

- Track 1 : Dubu_8
- Track 2 : phiSASD1_29
- Track 3 : Rowa_8
- Track 4 : AbbeyMikolon_8, Nesbitt_8
- Track 5 : PFR2_06, PFR1_06
- Track 6 : Trine_7
- Track 7 : Applejacks_7
- Track 8 : Morrissey_7
- Track 9 : Puppies_7
- Track 10 : Widow_7
- Track 11 : Gustav_7
- Track 12 : Upyo_7
- Track 13 : Mahdia_7
- Track 14 : DonkeyMan_8, Tarzan_8
- Track 15 : DearBasketball_8
- Track 16 : Heinz_8
- Track 17 : Hibiscus_8
- Track 18 : Jojo24_8
- Track 19 : DinoNuggs_9, Reyja_9
- Track 20 : Santhid_8
- Track 21 : GlobiWarming_9, Judy_9, NidoQ_9, NikkiHotWheels_9
- Track 22 : PeggyLeg03_9, Constance_9, FosterFrank_9
- Track 23 : ChuckDuck_9, LittleRon_9, KayMoney_9
- Track 24 : Pucara_9, LilyBell_9, HotPotato_9
- Track 25 : Bridgette_9, Henrique_9
- Track 26 : Eileen_9, Peas_9
- Track 27 : Karkharias_9
- Track 28 : Gibbzilla_9
- Track 29 : Shambre1_9
- Track 30 : Kromp_9

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

The start number called the most often in the published annotations is 2, it was called in 18 of the 33 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- AbbeyMikolon_8, Bridgette_9, ChuckDuck_9, Constance_9, Dubu_8, Eileen_9, FosterFrank_9, GlobiWarming_9, Henrique_9, HotPotato_9, Judy_9, Karkharias_9, KayMoney_9, Kromp_9, LilyBell_9, LittleRon_9, Nesbitt_8, NidoQ_9, NikkiHotWheels_9, Peas_9, PeggyLeg03_9, Pucara_9, Rowa_8, phiSASD1_29,

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

-

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

- Applejacks_7, DearBasketball_8, DinoNuggs_9, DonkeyMan_8, Gibbzilla_9, Gustav_7, Heinz_8, Hibiscus_8, Jojo24_8, Mahdia_7, Morrissey_7, PFR1_06, PFR2_06, Puppies_7, Reyja_9, Santhid_8, Shambre1_9, Tarzan_8, Trine_7, Upyo_7, Widow_7,

Summary by start number:

Start 1:

- Found in 1 of 45 (2.2%) of genes in pham
- No Manual Annotations of this start.
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Gibbzilla_9 (FB),

Start 2:

- Found in 24 of 45 (53.3%) of genes in pham
- Manual Annotations of this start: 18 of 33
- Called 100.0% of time when present
- Phage (with cluster) where this start called: AbbeyMikolon_8 (BL), Bridgette_9 (FA), ChuckDuck_9 (FA), Constance_9 (FA), Dubu_8 (BJ), Eileen_9 (FA), FosterFrank_9 (FA), GlobiWarming_9 (FA), Henrique_9 (FA), HotPotato_9 (FA), Judy_9 (FA), Karkharias_9 (FA), KayMoney_9 (FA), Kromp_9 (singleton), LilyBell_9 (FA), LittleRon_9 (FA), Nesbitt_8 (BL), NidoQ_9 (FA), NikkiHotWheels_9 (FA), Peas_9 (FA), PeggyLeg03_9 (FA), Pucara_9 (FA), Rowa_8 (BL), phiSASD1_29 (BJ),

Start 3:

- Found in 19 of 45 (42.2%) of genes in pham
- Manual Annotations of this start: 1 of 33
- Called 5.3% of time when present
- Phage (with cluster) where this start called: Shambre1_9 (singleton),

Start 4:

- Found in 2 of 45 (4.4%) of genes in pham
- No Manual Annotations of this start.
- Called 100.0% of time when present
- Phage (with cluster) where this start called: PFR1_06 (BX), PFR2_06 (BX),

Start 9:

- Found in 2 of 45 (4.4%) of genes in pham
- Manual Annotations of this start: 1 of 33
- Called 50.0% of time when present

- Phage (with cluster) where this start called: Trine_7 (CD),

Start 11:

- Found in 1 of 45 (2.2%) of genes in pham
- No Manual Annotations of this start.
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Applejacks_7 (CD),

Start 12:

- Found in 1 of 45 (2.2%) of genes in pham
- Manual Annotations of this start: 1 of 33
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Morrissey_7 (CD),

Start 13:

- Found in 6 of 45 (13.3%) of genes in pham
- Manual Annotations of this start: 5 of 33
- Called 83.3% of time when present
- Phage (with cluster) where this start called: Gustav_7 (CD), Mahdia_7 (CD), Puppies_7 (CD), Upyo_7 (CD), Widow_7 (CD),

Start 16:

- Found in 9 of 45 (20.0%) of genes in pham
- Manual Annotations of this start: 7 of 33
- Called 100.0% of time when present
- Phage (with cluster) where this start called: DearBasketball_8 (DY), DinoNuggs_9 (DY), DonkeyMan_8 (DY), Heinz_8 (DY), Hibiscus_8 (DY), Jojo24_8 (DY), Reyja_9 (DY), Santhid_8 (DY), Tarzan_8 (DY),

Summary by clusters:

There are 8 clusters represented in this pham: singleton, BL, BJ, CD, FA, FB, DY, BX,

Info for manual annotations of cluster BJ:

- Start number 2 was manually annotated 1 time for cluster BJ.

Info for manual annotations of cluster BL:

- Start number 2 was manually annotated 3 times for cluster BL.

Info for manual annotations of cluster CD:

- Start number 9 was manually annotated 1 time for cluster CD.
- Start number 12 was manually annotated 1 time for cluster CD.
- Start number 13 was manually annotated 5 times for cluster CD.

Info for manual annotations of cluster DY:

- Start number 16 was manually annotated 7 times for cluster DY.

Info for manual annotations of cluster FA:

- Start number 2 was manually annotated 13 times for cluster FA.

Gene Information:

Gene: AbbeyMikolon_8 Start: 6661, Stop: 7194, Start Num: 2

Candidate Starts for AbbeyMikolon_8:

(Start: 2 @6661 has 18 MA's), (10, 6706), (14, 6718), (19, 6757), (22, 6772), (35, 6844), (40, 6865), (44, 6877), (45, 6883), (63, 6955), (65, 6964), (71, 6997), (90, 7078), (96, 7105), (110, 7177), (111, 7180),

Gene: Applejacks_7 Start: 5984, Stop: 6535, Start Num: 11

Candidate Starts for Applejacks_7:

(11, 5984), (29, 6086), (31, 6095), (38, 6119), (40, 6131), (51, 6170), (55, 6194), (57, 6212), (71, 6317), (72, 6323), (76, 6347), (88, 6395), (89, 6401), (105, 6515),

Gene: Bridgette_9 Start: 7210, Stop: 7803, Start Num: 2

Candidate Starts for Bridgette_9:

(Start: 2 @7210 has 18 MA's), (Start: 3 @7222 has 1 MA's), (14, 7267), (18, 7291), (30, 7369), (32, 7375), (36, 7390), (37, 7393), (52, 7453), (58, 7486), (83, 7627), (84, 7630), (99, 7729), (102, 7750),

Gene: ChuckDuck_9 Start: 7169, Stop: 7759, Start Num: 2

Candidate Starts for ChuckDuck_9:

(Start: 2 @7169 has 18 MA's), (Start: 3 @7181 has 1 MA's), (14, 7226), (32, 7334), (72, 7517), (73, 7523), (83, 7583), (84, 7586), (99, 7685), (102, 7706),

Gene: Constance_9 Start: 7215, Stop: 7805, Start Num: 2

Candidate Starts for Constance_9:

(Start: 2 @7215 has 18 MA's), (Start: 3 @7227 has 1 MA's), (14, 7272), (73, 7569), (83, 7629), (84, 7632), (99, 7731), (102, 7752), (111, 7791),

Gene: DearBasketball_8 Start: 6284, Stop: 6817, Start Num: 16

Candidate Starts for DearBasketball_8:

(Start: 16 @6284 has 7 MA's), (31, 6380), (44, 6431), (73, 6611), (107, 6806),

Gene: DinoNuggs_9 Start: 6424, Stop: 6957, Start Num: 16

Candidate Starts for DinoNuggs_9:

(Start: 16 @6424 has 7 MA's), (38, 6544), (73, 6751), (103, 6922), (107, 6946),

Gene: DonkeyMan_8 Start: 6278, Stop: 6811, Start Num: 16

Candidate Starts for DonkeyMan_8:

(Start: 16 @6278 has 7 MA's), (31, 6374), (44, 6425), (45, 6431), (73, 6605), (107, 6800),

Gene: Dubu_8 Start: 6313, Stop: 6891, Start Num: 2

Candidate Starts for Dubu_8:

(Start: 2 @6313 has 18 MA's), (17, 6391), (19, 6409), (44, 6529), (66, 6640), (74, 6682), (95, 6784), (98, 6814),

Gene: Eileen_9 Start: 7175, Stop: 7768, Start Num: 2

Candidate Starts for Eileen_9:

(Start: 2 @7175 has 18 MA's), (Start: 3 @7187 has 1 MA's), (14, 7232), (30, 7334), (32, 7340), (36, 7355), (37, 7358), (52, 7418), (58, 7451), (83, 7592), (102, 7715),

Gene: FosterFrank_9 Start: 7173, Stop: 7763, Start Num: 2

Candidate Starts for FosterFrank_9:

(Start: 2 @7173 has 18 MA's), (Start: 3 @7185 has 1 MA's), (14, 7230), (73, 7527), (83, 7587), (84, 7590), (99, 7689), (102, 7710), (111, 7749),

Gene: Gibbzilla_9 Start: 6357, Stop: 6959, Start Num: 1

Candidate Starts for Gibbzilla_9:

(1, 6357), (21, 6498), (26, 6534), (29, 6552), (43, 6606), (45, 6615), (57, 6675), (80, 6801), (81, 6804), (93, 6852), (95, 6876), (109, 6951),

Gene: GlobiWarming_9 Start: 7170, Stop: 7760, Start Num: 2

Candidate Starts for GlobiWarming_9:

(Start: 2 @7170 has 18 MA's), (Start: 3 @7182 has 1 MA's), (14, 7227), (72, 7518), (73, 7524), (83, 7584), (84, 7587), (99, 7686), (102, 7707),

Gene: Gustav_7 Start: 6033, Stop: 6599, Start Num: 13

Candidate Starts for Gustav_7:

(Start: 13 @6033 has 5 MA's), (23, 6093), (29, 6141), (38, 6174), (40, 6186), (45, 6204), (51, 6225), (72, 6378), (73, 6384), (78, 6408), (83, 6444), (94, 6507), (100, 6546), (106, 6582),

Gene: Heinz_8 Start: 6314, Stop: 6847, Start Num: 16

Candidate Starts for Heinz_8:

(Start: 16 @6314 has 7 MA's), (38, 6434), (73, 6641), (94, 6752), (103, 6812), (107, 6836),

Gene: Henrique_9 Start: 7171, Stop: 7764, Start Num: 2

Candidate Starts for Henrique_9:

(Start: 2 @7171 has 18 MA's), (Start: 3 @7183 has 1 MA's), (14, 7228), (18, 7252), (30, 7330), (32, 7336), (36, 7351), (37, 7354), (52, 7414), (58, 7447), (83, 7588), (84, 7591), (99, 7690), (102, 7711),

Gene: Hibiscus_8 Start: 6288, Stop: 6821, Start Num: 16

Candidate Starts for Hibiscus_8:

(Start: 16 @6288 has 7 MA's), (38, 6408), (73, 6615), (79, 6642), (103, 6786), (107, 6810),

Gene: HotPotato_9 Start: 7175, Stop: 7768, Start Num: 2

Candidate Starts for HotPotato_9:

(Start: 2 @7175 has 18 MA's), (Start: 3 @7187 has 1 MA's), (14, 7232), (30, 7334), (32, 7340), (36, 7355), (37, 7358), (52, 7418), (58, 7451), (83, 7592), (84, 7595), (102, 7715),

Gene: Jojo24_8 Start: 6283, Stop: 6816, Start Num: 16

Candidate Starts for Jojo24_8:

(Start: 16 @6283 has 7 MA's), (38, 6403), (53, 6463), (73, 6610), (79, 6637), (103, 6781), (107, 6805),

Gene: Judy_9 Start: 7214, Stop: 7804, Start Num: 2

Candidate Starts for Judy_9:

(Start: 2 @7214 has 18 MA's), (Start: 3 @7226 has 1 MA's), (14, 7271), (72, 7562), (73, 7568), (83, 7628), (84, 7631), (99, 7730), (102, 7751),

Gene: Karkharias_9 Start: 7171, Stop: 7764, Start Num: 2

Candidate Starts for Karkharias_9:

(Start: 2 @7171 has 18 MA's), (Start: 3 @7183 has 1 MA's), (14, 7228), (30, 7330), (32, 7336), (36, 7351), (37, 7354), (58, 7447), (83, 7588), (84, 7591), (99, 7690), (102, 7711),

Gene: KayMoney_9 Start: 7171, Stop: 7761, Start Num: 2

Candidate Starts for KayMoney_9:

(Start: 2 @7171 has 18 MA's), (Start: 3 @7183 has 1 MA's), (14, 7228), (32, 7336), (72, 7519), (73, 7525), (83, 7585), (84, 7588), (99, 7687), (102, 7708),

Gene: Kromp_9 Start: 7708, Stop: 8337, Start Num: 2

Candidate Starts for Kromp_9:

(Start: 2 @7708 has 18 MA's), (10, 7753), (15, 7768), (24, 7837), (48, 7942), (50, 7945), (56, 7975), (68, 8059), (70, 8083), (73, 8110), (81, 8158), (82, 8164), (95, 8233), (96, 8245), (111, 8323),

Gene: LilyBell_9 Start: 7186, Stop: 7779, Start Num: 2

Candidate Starts for LilyBell_9:

(Start: 2 @7186 has 18 MA's), (Start: 3 @7198 has 1 MA's), (14, 7243), (30, 7345), (32, 7351), (36, 7366), (37, 7369), (52, 7429), (58, 7462), (83, 7603), (84, 7606), (102, 7726),

Gene: LittleRon_9 Start: 7169, Stop: 7759, Start Num: 2

Candidate Starts for LittleRon_9:

(Start: 2 @7169 has 18 MA's), (Start: 3 @7181 has 1 MA's), (14, 7226), (32, 7334), (72, 7517), (73, 7523), (83, 7583), (84, 7586), (99, 7685), (102, 7706),

Gene: Mahdia_7 Start: 6047, Stop: 6601, Start Num: 13

Candidate Starts for Mahdia_7:

(Start: 13 @6047 has 5 MA's), (23, 6107), (29, 6155), (38, 6188), (40, 6200), (45, 6218), (51, 6239), (69, 6356), (72, 6395), (88, 6467), (94, 6509),

Gene: Morrissey_7 Start: 6029, Stop: 6574, Start Num: 12

Candidate Starts for Morrissey_7:

(Start: 12 @6029 has 1 MA's), (29, 6131), (40, 6176), (45, 6194), (49, 6212), (72, 6368), (73, 6374), (88, 6440), (94, 6482), (106, 6557),

Gene: Nesbitt_8 Start: 6733, Stop: 7266, Start Num: 2

Candidate Starts for Nesbitt_8:

(Start: 2 @6733 has 18 MA's), (10, 6778), (14, 6790), (19, 6829), (22, 6844), (35, 6916), (40, 6937), (44, 6949), (45, 6955), (63, 7027), (65, 7036), (71, 7069), (90, 7150), (96, 7177), (110, 7249), (111, 7252),

Gene: NidoQ_9 Start: 7232, Stop: 7822, Start Num: 2

Candidate Starts for NidoQ_9:

(Start: 2 @7232 has 18 MA's), (Start: 3 @7244 has 1 MA's), (14, 7289), (72, 7580), (73, 7586), (83, 7646), (84, 7649), (99, 7748), (102, 7769),

Gene: NikkiHotWheels_9 Start: 7172, Stop: 7762, Start Num: 2

Candidate Starts for NikkiHotWheels_9:

(Start: 2 @7172 has 18 MA's), (Start: 3 @7184 has 1 MA's), (14, 7229), (72, 7520), (73, 7526), (83, 7586), (84, 7589), (99, 7688), (102, 7709),

Gene: PFR1_06 Start: 6360, Stop: 6935, Start Num: 4

Candidate Starts for PFR1_06:

(4, 6360), (6, 6363), (8, 6375), (20, 6438), (42, 6546), (46, 6567), (53, 6585), (60, 6633), (64, 6645), (72, 6729), (84, 6780), (85, 6783), (86, 6786), (87, 6789), (104, 6903), (107, 6924), (109, 6927),

Gene: PFR2_06 Start: 6360, Stop: 6935, Start Num: 4

Candidate Starts for PFR2_06:

(4, 6360), (6, 6363), (8, 6375), (20, 6438), (42, 6546), (46, 6567), (53, 6585), (60, 6633), (64, 6645), (72, 6729), (84, 6780), (85, 6783), (86, 6786), (87, 6789), (104, 6903), (107, 6924), (109, 6927),

Gene: Peas_9 Start: 7175, Stop: 7768, Start Num: 2

Candidate Starts for Peas_9:

(Start: 2 @7175 has 18 MA's), (Start: 3 @7187 has 1 MA's), (14, 7232), (30, 7334), (32, 7340), (36, 7355), (37, 7358), (52, 7418), (58, 7451), (83, 7592), (102, 7715),

Gene: PeggyLeg03_9 Start: 7215, Stop: 7805, Start Num: 2

Candidate Starts for PeggyLeg03_9:

(Start: 2 @7215 has 18 MA's), (Start: 3 @7227 has 1 MA's), (14, 7272), (73, 7569), (83, 7629), (84, 7632), (99, 7731), (102, 7752), (111, 7791),

Gene: Pucara_9 Start: 7174, Stop: 7767, Start Num: 2

Candidate Starts for Pucara_9:

(Start: 2 @7174 has 18 MA's), (Start: 3 @7186 has 1 MA's), (14, 7231), (30, 7333), (32, 7339), (36, 7354), (37, 7357), (52, 7417), (58, 7450), (83, 7591), (84, 7594), (102, 7714),

Gene: Puppies_7 Start: 5969, Stop: 6499, Start Num: 13

Candidate Starts for Puppies_7:

(Start: 13 @5969 has 5 MA's), (25, 6032), (27, 6044), (29, 6056), (40, 6101), (55, 6164), (57, 6182), (62, 6203), (71, 6284), (72, 6290), (97, 6431),

Gene: Reyja_9 Start: 6424, Stop: 6957, Start Num: 16

Candidate Starts for Reyja_9:

(Start: 16 @6424 has 7 MA's), (38, 6544), (73, 6751), (103, 6922), (107, 6946),

Gene: Rowa_8 Start: 6493, Stop: 7023, Start Num: 2

Candidate Starts for Rowa_8:

(Start: 2 @6493 has 18 MA's), (10, 6538), (19, 6589), (34, 6673), (41, 6700), (49, 6730), (59, 6775), (66, 6799), (71, 6826), (108, 7003), (110, 7006), (111, 7009),

Gene: Santhid_8 Start: 6292, Stop: 6825, Start Num: 16

Candidate Starts for Santhid_8:

(Start: 16 @6292 has 7 MA's), (38, 6412), (53, 6472), (73, 6619), (103, 6790), (107, 6814),

Gene: Shambre1_9 Start: 7586, Stop: 8185, Start Num: 3

Candidate Starts for Shambre1_9:

(Start: 3 @7586 has 1 MA's), (5, 7601), (7, 7604), (Start: 9 @7619 has 1 MA's), (47, 7808), (48, 7814), (54, 7829), (91, 8051), (102, 8141),

Gene: Tarzan_8 Start: 6283, Stop: 6816, Start Num: 16

Candidate Starts for Tarzan_8:

(Start: 16 @6283 has 7 MA's), (31, 6379), (44, 6430), (45, 6436), (73, 6610), (107, 6805),

Gene: Trine_7 Start: 5978, Stop: 6505, Start Num: 9

Candidate Starts for Trine_7:

(Start: 9 @5978 has 1 MA's), (Start: 13 @5984 has 5 MA's), (29, 6071), (33, 6089), (40, 6116), (45, 6134), (51, 6155), (62, 6218), (72, 6305), (88, 6371), (92, 6386), (107, 6494),

Gene: Upyo_7 Start: 5995, Stop: 6522, Start Num: 13

Candidate Starts for Upyo_7:

(Start: 13 @5995 has 5 MA's), (29, 6082), (33, 6100), (38, 6115), (39, 6124), (40, 6127), (45, 6145), (51, 6166), (61, 6226), (67, 6268),

Gene: Widow_7 Start: 5960, Stop: 6490, Start Num: 13

Candidate Starts for Widow_7:

(Start: 13 @5960 has 5 MA's), (25, 6023), (27, 6035), (29, 6047), (40, 6092), (55, 6155), (57, 6173), (71, 6275), (72, 6281), (97, 6422),

Gene: phiSASD1_29 Start: 6506, Stop: 7102, Start Num: 2

Candidate Starts for phiSASD1_29:

(Start: 2 @6506 has 18 MA's), (22, 6617), (28, 6662), (44, 6722), (65, 6827), (66, 6833), (74, 6875), (75, 6884), (77, 6893), (99, 7025), (101, 7043), (111, 7088),