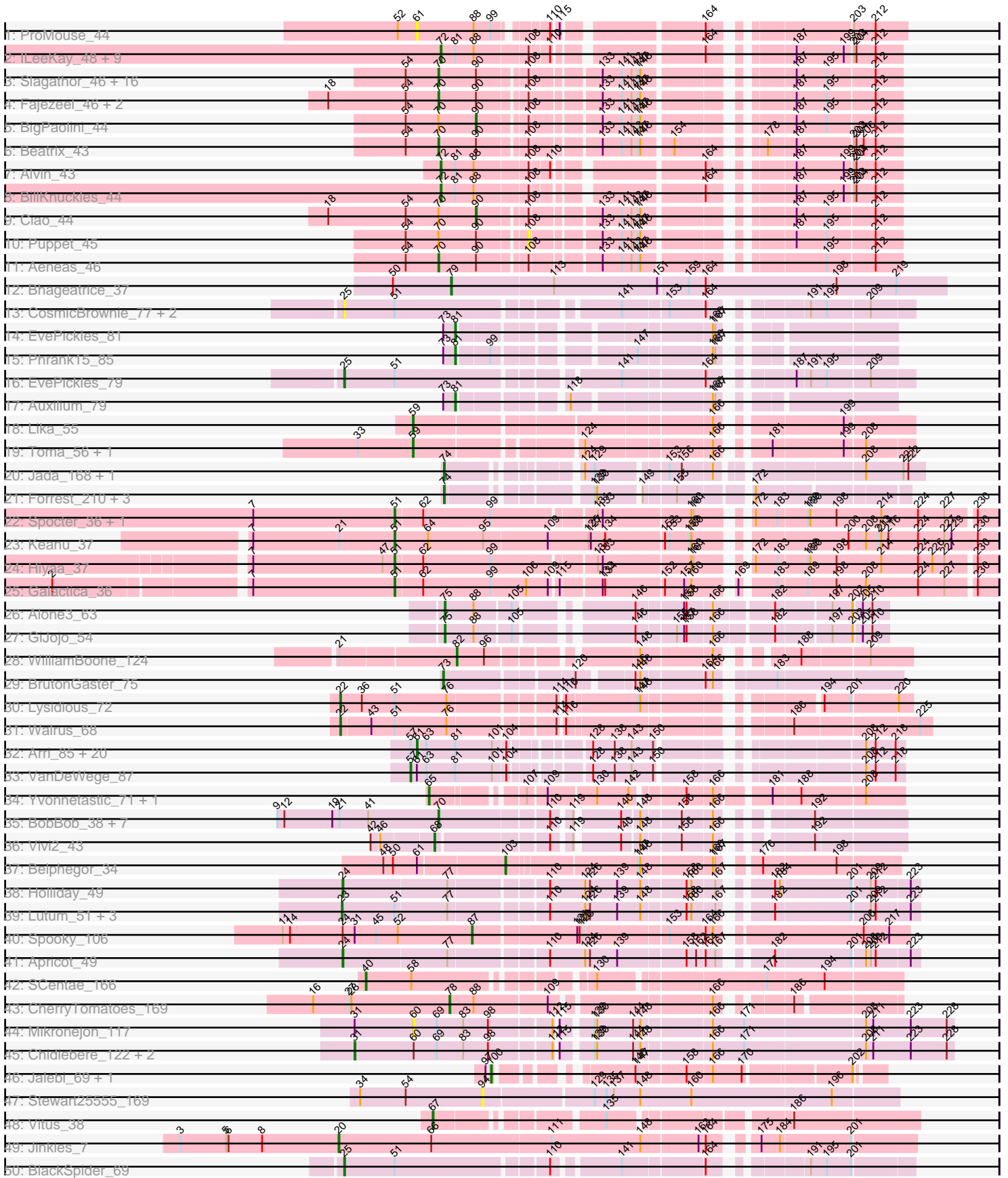


Pham 294496



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 294496 Report

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

Pham number 294496 has 149 members, 10 are drafts.

Phages represented in each track:

- Track 1 : ProMouse_44
- Track 2 : ILeeKay_48, Fushigi_42, Trouble_45, BluSpix_41, IgnatiusPatJac_43, Ajay_44, Seanderson_46, Kykar_44, Marco3_46, Petruccio_44
- Track 3 : Slagathor_46, Naira_45, Marge_44, StrongArm_43, Eyeball_45, Bexan_42, Dexes_44, TheloniousMonk_45, Fenn_45, Niza_46, Rajelicia_45, Arcanine_45, Bones_44, Licorice_47, Ruotula_47, Sagefire_47, Smairt_46
- Track 4 : Fajezeel_46, Greg_46, Pippin_46
- Track 5 : BigPaolini_44
- Track 6 : Beatrix_43
- Track 7 : Alvin_43
- Track 8 : BillKnuckles_44
- Track 9 : Ciao_44
- Track 10 : Puppet_45
- Track 11 : Aeneas_46
- Track 12 : Bhageatrice_37
- Track 13 : CosmicBrownie_77, Lasker_82, GumGum_85
- Track 14 : EvePickles_81
- Track 15 : Phrank15_85
- Track 16 : EvePickles_79
- Track 17 : Auxilium_79
- Track 18 : Lika_55
- Track 19 : Toma_56, Goby_56
- Track 20 : Jada_168, Forrest_171
- Track 21 : Forrest_210, Phredrick_212, Emma1919_210, DeluluLabubu_212
- Track 22 : Spocter_36, Kokushibo_38
- Track 23 : Keanu_37
- Track 24 : Hiyaa_37
- Track 25 : Galactica_36
- Track 26 : Alone3_63
- Track 27 : GiJojo_54
- Track 28 : WilliamBoone_124
- Track 29 : BrutonGaster_75
- Track 30 : Lysidious_72
- Track 31 : Walrus_68
- Track 32 : Arri_85, PullumCavea_83, SmokingBunny_86, Twister6_84, Wizard_80, Fireball_88, PinkCoffee_86, Gezellig_81, TillyBobJoe_83, Salvador_85, CherryCola_84, RogerDodger_88, Savbucketdawg_80, Evamon_85, Phlop_82,

KimmyK_83, Valary_86, Togo_85, Egi03_83, Portcullis_85, Shinji_84

- Track 33 : VanDeWege_87
- Track 34 : Yvonnetastic_71, JonJames_73
- Track 35 : BobBob_38, Charming_41, Nordenberg_35, Love_44, Brandonk123_42, Paries_43, Tangent_41, Rofo_41
- Track 36 : Vivi2_43
- Track 37 : Belphegor_34
- Track 38 : Holliday_49
- Track 39 : Lutum_51, Kenna_50, BENtherdunthat_51, Getalong_54
- Track 40 : Spooky_106
- Track 41 : Apricot_49
- Track 42 : SCentae_166
- Track 43 : CherryTomatoes_169
- Track 44 : Mikronejon_117
- Track 45 : Chidiebere_122, Kabocha_123, Schomber_120
- Track 46 : Jalebi_69, Sampudon_70
- Track 47 : Stewart25555_169
- Track 48 : Vitus_38
- Track 49 : Jinkies_7
- Track 50 : BlackSpider_69
- Track 51 : Ariel_116, Courthouse_111, Squint_114, Superphikiman_113
- Track 52 : MiaZeal_116
- Track 53 : SkinnyPete_53, Aloeri_75, ChickenDinner_74, DocMcStuffins_74, Misha28_72, Awesomesauce_74, TootsiePop_72
- Track 54 : Megiddo_61
- Track 55 : ThulaThula_69
- Track 56 : Phayonce_65
- Track 57 : Pringar_51, Blackbeetle_51, Huphlepuuff_53, VasuNzinga_51, Raela_51, Beelzebub_55, Poise_51, Lilbit_50, Clarkson_52
- Track 58 : GoongGoong_50, LittleLaf_51
- Track 59 : Finkle_69
- Track 60 : Sunfish_75
- Track 61 : Footloose_49
- Track 62 : Mbo2_93

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

The start number called the most often in the published annotations is 70, it was called in 30 of the 139 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Aeneas_46, Arcanine_45, Beatrix_43, Bexan_42, BobBob_38, Bones_44, Brandonk123_42, Charming_41, Dexes_44, Eyeball_45, Fajezeel_46, Fenn_45, Greg_46, Licorice_47, Love_44, Marge_44, Naira_45, Niza_46, Nordenberg_35, Paries_43, Pippin_46, Rajelicia_45, Rofo_41, Ruotula_47, Sagefire_47, Slagathor_46, Smairt_46, StrongArm_43, Tangent_41, TheloniousMonk_45,

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

- BigPaolini_44, Ciao_44, Puppet_45,

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

- Ajay_44, Aloeri_75, Alone3_63, Alvin_43, Apricot_49, Ariel_116, Arri_85, Auxilium_79, Awesomesauce_74, BENtherdunthat_51, Beelzebub_55, Belphegor_34, Bhageatrice_37, BillKnuckles_44, BlackSpider_69, Blackbeetle_51, BluSpix_41, BrutonGaster_75, CherryCola_84, CherryTomatoes_169, ChickenDinner_74, Chidiebere_122, Clarkson_52, CosmicBrownie_77, Courthouse_111, DeluluLabubu_212, DocMcStuffins_74, Egi03_83, Emma1919_210, Evamon_85, EvePickles_79, EvePickles_81, Finkle_69, Fireball_88, Footloose_49, Forrest_171, Forrest_210, Fushigi_42, Galactica_36, Getalong_54, Gezellig_81, GiJojo_54, Goby_56, GoongGoong_50, GumGum_85, Hiyaa_37, Holliday_49, Huphlepuuff_53, ILeeKay_48, IgnatiusPatJac_43, Jada_168, Jalebi_69, Jinkies_7, JonJames_73, Kabocha_123, Keanu_37, Kenna_50, KimmyK_83, Kokushibo_38, Kykar_44, Lasker_82, Lika_55, Lilbit_50, LittleLaf_51, Lutum_51, Lysidious_72, Marco3_46, Mbo2_93, Megiddo_61, MiaZeal_116, Mikronejon_117, Misha28_72, Petruccio_44, Phayonce_65, Phlop_82, Phrank15_85, Phredrick_212, PinkCoffee_86, Poise_51, Portcullis_85, Pringar_51, ProMouse_44, PullumCavea_83, Raela_51, RogerDodger_88, SCentae_166, Salvador_85, Sampudon_70, Savbucketdawg_80, Schomber_120, Seanderson_46, Shinji_84, SkinnyPete_53, SmokingBunny_86, Spocster_36, Spooky_106, Squint_114, Stewart25555_169, Sunfish_75, Superphikiman_113, ThulaThula_69, TillyBobJoe_83, Togo_85, Toma_56, TootsiePop_72, Trouble_45, Twister6_84, Valary_86, VanDeWege_87, VasuNzinga_51, Vitus_38, Vivi2_43, Walrus_68, WilliamBoone_124, Wizard_80, Yvonnetastic_71,

Summary by start number:

Start 20:

- Found in 1 of 149 (0.7%) of genes in pham
- Manual Annotations of this start: 1 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Jinkies_7 (FL),

Start 22:

- Found in 2 of 149 (1.3%) of genes in pham
- Manual Annotations of this start: 2 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Lysidious_72 (CV), Walrus_68 (CV),

Start 23:

- Found in 4 of 149 (2.7%) of genes in pham
- Manual Annotations of this start: 4 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: BENtherdunthat_51 (DN1), Getalong_54 (DN1), Kenna_50 (DN1), Lutum_51 (DN1),

Start 24:

- Found in 3 of 149 (2.0%) of genes in pham
- Manual Annotations of this start: 2 of 139
- Called 66.7% of time when present
- Phage (with cluster) where this start called: Apricot_49 (DN3), Holliday_49 (DN1),

Start 25:

- Found in 6 of 149 (4.0%) of genes in pham

- Manual Annotations of this start: 2 of 139
- Called 83.3% of time when present
- Phage (with cluster) where this start called: BlackSpider_69 (FN), CosmicBrownie_77 (AY), EvePickles_79 (AY), GumGum_85 (AY), Lasker_82 (AY),

Start 26:

- Found in 9 of 149 (6.0%) of genes in pham
- Manual Annotations of this start: 9 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Aloeri_75 (F1), Awesomesauce_74 (F1), ChickenDinner_74 (F1), DocMcStuffins_74 (F1), Megiddo_61 (P1), Misha28_72 (F1), SkinnyPete_53 (N), ThulaThula_69 (P5), TootsiePop_72 (F1),

Start 29:

- Found in 1 of 149 (0.7%) of genes in pham
- Manual Annotations of this start: 1 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Phayonce_65 (P5),

Start 30:

- Found in 1 of 149 (0.7%) of genes in pham
- Manual Annotations of this start: 1 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Footloose_49 (singleton),

Start 31:

- Found in 5 of 149 (3.4%) of genes in pham
- Manual Annotations of this start: 3 of 139
- Called 60.0% of time when present
- Phage (with cluster) where this start called: Chidiebere_122 (DQ), Kabocha_123 (DQ), Schomber_120 (DQ),

Start 38:

- Found in 1 of 149 (0.7%) of genes in pham
- No Manual Annotations of this start.
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Mbo2_93 (singleton),

Start 40:

- Found in 1 of 149 (0.7%) of genes in pham
- Manual Annotations of this start: 1 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: SCentae_166 (DO),

Start 51:

- Found in 25 of 149 (16.8%) of genes in pham
- Manual Annotations of this start: 4 of 139
- Called 20.0% of time when present
- Phage (with cluster) where this start called: Galactica_36 (BQ), Hiyaa_37 (BQ), Keanu_37 (BQ), Kokushibo_38 (BQ), Spocter_36 (BQ),

Start 56:

- Found in 1 of 149 (0.7%) of genes in pham

- Manual Annotations of this start: 1 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Finkle_69 (singleton),

Start 57:

- Found in 22 of 149 (14.8%) of genes in pham
- Manual Annotations of this start: 1 of 139
- Called 4.5% of time when present
- Phage (with cluster) where this start called: VanDeWege_87 (DC1),

Start 59:

- Found in 3 of 149 (2.0%) of genes in pham
- Manual Annotations of this start: 3 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Goby_56 (BD1), Lika_55 (BD1), Toma_56 (BD1),

Start 60:

- Found in 4 of 149 (2.7%) of genes in pham
- No Manual Annotations of this start.
- Called 25.0% of time when present
- Phage (with cluster) where this start called: Mikronejon_117 (DQ),

Start 61:

- Found in 25 of 149 (16.8%) of genes in pham
- Manual Annotations of this start: 20 of 139
- Called 88.0% of time when present
- Phage (with cluster) where this start called: Arri_85 (DC1), CherryCola_84 (DC1), Egi03_83 (DC1), Evamon_85 (DC1), Fireball_88 (DC1), Gezellig_81 (DC1), KimmyK_83 (DC1), Phlop_82 (DC1), PinkCoffee_86 (DC1), Portcullis_85 (DC1), ProMouse_44 (A1), PullumCavea_83 (DC1), RogerDodger_88 (DC1), Salvador_85 (DC1), Savbucketdawg_80 (DC1), Shinji_84 (DC1), SmokingBunny_86 (DC1), TillyBobJoe_83 (DC1), Togo_85 (DC1), Twister6_84 (DC1), Valary_86 (DC1), Wizard_80 (DC1),

Start 62:

- Found in 9 of 149 (6.0%) of genes in pham
- Manual Annotations of this start: 5 of 139
- Called 55.6% of time when present
- Phage (with cluster) where this start called: Ariel_116 (J), Courthouse_111 (J), MiaZeal_116 (J), Squint_114 (J), Superphikiman_113 (J),

Start 65:

- Found in 2 of 149 (1.3%) of genes in pham
- Manual Annotations of this start: 2 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: JonJames_73 (DD), Yvonnetastic_71 (DD),

Start 67:

- Found in 1 of 149 (0.7%) of genes in pham
- Manual Annotations of this start: 1 of 139
- Called 100.0% of time when present

- Phage (with cluster) where this start called: Vitus_38 (FL),

Start 68:

- Found in 1 of 149 (0.7%) of genes in pham
- Manual Annotations of this start: 1 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Vivi2_43 (DE1),

Start 70:

- Found in 33 of 149 (22.1%) of genes in pham
- Manual Annotations of this start: 30 of 139
- Called 90.9% of time when present
- Phage (with cluster) where this start called: Aeneas_46 (A1), Arcanine_45 (A1), Beatrix_43 (A1), Bexan_42 (A1), BobBob_38 (DE1), Bones_44 (A1), Brandonk123_42 (DE1), Charming_41 (DE1), Dexes_44 (A1), Eyeball_45 (A1), Fajezeel_46 (A1), Fenn_45 (A1), Greg_46 (A1), Licorice_47 (A1), Love_44 (DE1), Marge_44 (A1), Naira_45 (A1), Niza_46 (A1), Nordenberg_35 (DE1), Paries_43 (DE1), Pippin_46 (A1), Rajelicia_45 (A1), Rofo_41 (DE1), Ruotula_47 (A1), Sagefire_47 (A1), Slagathor_46 (A1), Smairt_46 (A1), StrongArm_43 (A1), Tangent_41 (DE1), TheloniousMonk_45 (A1),

Start 72:

- Found in 12 of 149 (8.1%) of genes in pham
- Manual Annotations of this start: 12 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Ajay_44 (A1), Alvin_43 (A1), BillKnuckles_44 (A1), BluSpix_41 (A1), Fushigi_42 (A1), ILeeKay_48 (A1), IgnatiusPatJac_43 (A1), Kykar_44 (A1), Marco3_46 (A1), Petruccio_44 (A1), Seanderson_46 (A1), Trouble_45 (A1),

Start 73:

- Found in 4 of 149 (2.7%) of genes in pham
- Manual Annotations of this start: 1 of 139
- Called 25.0% of time when present
- Phage (with cluster) where this start called: BrutonGaster_75 (CQ2),

Start 74:

- Found in 6 of 149 (4.0%) of genes in pham
- Manual Annotations of this start: 6 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: DeluluLabubu_212 (BK1), Emma1919_210 (BK1), Forrest_171 (BK1), Forrest_210 (BK1), Jada_168 (BK1), Phredrick_212 (BK1),

Start 75:

- Found in 2 of 149 (1.3%) of genes in pham
- Manual Annotations of this start: 2 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Alone3_63 (BS), GiJojo_54 (BS),

Start 76:

- Found in 5 of 149 (3.4%) of genes in pham
- Manual Annotations of this start: 1 of 139

- Called 20.0% of time when present
- Phage (with cluster) where this start called: Sunfish_75 (singleton),

Start 78:

- Found in 1 of 149 (0.7%) of genes in pham
- Manual Annotations of this start: 1 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: CherryTomatoes_169 (DO),

Start 79:

- Found in 12 of 149 (8.1%) of genes in pham
- Manual Annotations of this start: 10 of 139
- Called 83.3% of time when present
- Phage (with cluster) where this start called: Beelzebub_55 (S), Bhageatrice_37 (AY), Blackbeetle_51 (S), Clarkson_52 (S), Huphlepuuff_53 (S), Lilbit_50 (S), Poise_51 (S), Pringar_51 (S), Raela_51 (S), VasuNzinga_51 (S),

Start 81:

- Found in 37 of 149 (24.8%) of genes in pham
- Manual Annotations of this start: 3 of 139
- Called 8.1% of time when present
- Phage (with cluster) where this start called: Auxilium_79 (AY), EvePickles_81 (AY), Phrank15_85 (AY),

Start 82:

- Found in 1 of 149 (0.7%) of genes in pham
- Manual Annotations of this start: 1 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: WilliamBoone_124 (CQ1),

Start 87:

- Found in 1 of 149 (0.7%) of genes in pham
- Manual Annotations of this start: 1 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Spooky_106 (DN2),

Start 89:

- Found in 11 of 149 (7.4%) of genes in pham
- Manual Annotations of this start: 2 of 139
- Called 18.2% of time when present
- Phage (with cluster) where this start called: GoongGoong_50 (S), LittleLaf_51 (S),

Start 90:

- Found in 25 of 149 (16.8%) of genes in pham
- Manual Annotations of this start: 2 of 139
- Called 8.0% of time when present
- Phage (with cluster) where this start called: BigPaolini_44 (A1), Ciao_44 (A1),

Start 94:

- Found in 1 of 149 (0.7%) of genes in pham
- No Manual Annotations of this start.
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Stewart25555_169 (FC),

Start 100:

- Found in 2 of 149 (1.3%) of genes in pham
- Manual Annotations of this start: 2 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Jalebi_69 (DV), Sampudon_70 (DV),

Start 103:

- Found in 1 of 149 (0.7%) of genes in pham
- Manual Annotations of this start: 1 of 139
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Belphegor_34 (DE2),

Start 108:

- Found in 37 of 149 (24.8%) of genes in pham
- No Manual Annotations of this start.
- Called 2.7% of time when present
- Phage (with cluster) where this start called: Puppet_45 (A1),

Summary by clusters:

There are 29 clusters represented in this pham: DO, singleton, DD, FC, BQ, BS, DV, FL, FN, DQ, A1, BD1, DN3, DN2, DN1, CQ1, P1, P5, J, N, S, BK1, CQ2, AY, CV, DC1, F1, DE1, DE2,

Info for manual annotations of cluster A1:

- Start number 70 was manually annotated 22 times for cluster A1.
- Start number 72 was manually annotated 12 times for cluster A1.
- Start number 90 was manually annotated 2 times for cluster A1.

Info for manual annotations of cluster AY:

- Start number 25 was manually annotated 1 time for cluster AY.
- Start number 79 was manually annotated 1 time for cluster AY.
- Start number 81 was manually annotated 3 times for cluster AY.

Info for manual annotations of cluster BD1:

- Start number 59 was manually annotated 3 times for cluster BD1.

Info for manual annotations of cluster BK1:

- Start number 74 was manually annotated 6 times for cluster BK1.

Info for manual annotations of cluster BQ:

- Start number 51 was manually annotated 4 times for cluster BQ.

Info for manual annotations of cluster BS:

- Start number 75 was manually annotated 2 times for cluster BS.

Info for manual annotations of cluster CQ1:

- Start number 82 was manually annotated 1 time for cluster CQ1.

Info for manual annotations of cluster CQ2:

- Start number 73 was manually annotated 1 time for cluster CQ2.

Info for manual annotations of cluster CV:

- Start number 22 was manually annotated 2 times for cluster CV.

Info for manual annotations of cluster DC1:

- Start number 57 was manually annotated 1 time for cluster DC1.
- Start number 61 was manually annotated 20 times for cluster DC1.

Info for manual annotations of cluster DD:

- Start number 65 was manually annotated 2 times for cluster DD.

Info for manual annotations of cluster DE1:

- Start number 68 was manually annotated 1 time for cluster DE1.
- Start number 70 was manually annotated 8 times for cluster DE1.

Info for manual annotations of cluster DE2:

- Start number 103 was manually annotated 1 time for cluster DE2.

Info for manual annotations of cluster DN1:

- Start number 23 was manually annotated 4 times for cluster DN1.
- Start number 24 was manually annotated 1 time for cluster DN1.

Info for manual annotations of cluster DN2:

- Start number 87 was manually annotated 1 time for cluster DN2.

Info for manual annotations of cluster DN3:

- Start number 24 was manually annotated 1 time for cluster DN3.

Info for manual annotations of cluster DO:

- Start number 40 was manually annotated 1 time for cluster DO.
- Start number 78 was manually annotated 1 time for cluster DO.

Info for manual annotations of cluster DQ:

- Start number 31 was manually annotated 3 times for cluster DQ.

Info for manual annotations of cluster DV:

- Start number 100 was manually annotated 2 times for cluster DV.

Info for manual annotations of cluster F1:

- Start number 26 was manually annotated 6 times for cluster F1.

Info for manual annotations of cluster FL:

- Start number 20 was manually annotated 1 time for cluster FL.
- Start number 67 was manually annotated 1 time for cluster FL.

Info for manual annotations of cluster FN:

- Start number 25 was manually annotated 1 time for cluster FN.

Info for manual annotations of cluster J:

- Start number 62 was manually annotated 5 times for cluster J.

Info for manual annotations of cluster N:

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

Info for manual annotations of cluster P1:

- Start number 26 was manually annotated 1 time for cluster P1.

Info for manual annotations of cluster P5:

- Start number 26 was manually annotated 1 time for cluster P5.
- Start number 29 was manually annotated 1 time for cluster P5.

Info for manual annotations of cluster S:

- Start number 79 was manually annotated 9 times for cluster S.
- Start number 89 was manually annotated 2 times for cluster S.

Gene Information:

Gene: Aeneas_46 Start: 33206, Stop: 32721, Start Num: 70

Candidate Starts for Aeneas_46:

(54, 33245), (Start: 70 @33206 has 30 MA's), (Start: 90 @33164 has 2 MA's), (108, 33110), (133, 33035), (141, 33011), (143, 32999), (147, 32993), (148, 32990), (195, 32807), (212, 32750),

Gene: Ajay_44 Start: 32810, Stop: 32334, Start Num: 72

Candidate Starts for Ajay_44:

(Start: 72 @32810 has 12 MA's), (Start: 81 @32792 has 3 MA's), (88, 32771), (108, 32708), (110, 32687), (164, 32534), (187, 32456), (199, 32399), (203, 32390), (204, 32387), (212, 32363),

Gene: Aloeri_75 Start: 46126, Stop: 46713, Start Num: 26

Candidate Starts for Aloeri_75:

(15, 46072), (Start: 26 @46126 has 9 MA's), (35, 46144), (49, 46177), (Start: 51 @46186 has 4 MA's), (55, 46201), (91, 46282), (109, 46348), (141, 46420), (153, 46471), (166, 46522), (184, 46573), (188, 46597), (201, 46654),

Gene: Alone3_63 Start: 21624, Stop: 22094, Start Num: 75

Candidate Starts for Alone3_63:

(Start: 75 @21624 has 2 MA's), (88, 21660), (105, 21702), (146, 21816), (157, 21870), (158, 21873), (166, 21903), (182, 21969), (197, 22029), (202, 22053), (205, 22062), (210, 22074),

Gene: Alvin_43 Start: 33331, Stop: 32855, Start Num: 72

Candidate Starts for Alvin_43:

(Start: 72 @33331 has 12 MA's), (Start: 81 @33313 has 3 MA's), (88, 33292), (108, 33229), (110, 33208), (164, 33055), (187, 32977), (199, 32920), (203, 32911), (204, 32908), (212, 32884),

Gene: Apricot_49 Start: 33085, Stop: 32453, Start Num: 24

Candidate Starts for Apricot_49:

(Start: 24 @33085 has 2 MA's), (77, 32965), (110, 32854), (124, 32812), (126, 32806), (139, 32773), (158, 32695), (162, 32683), (164, 32674), (167, 32662), (182, 32617), (201, 32530), (208, 32515), (209, 32509), (212, 32503), (223, 32464),

Gene: Arcanine_45 Start: 32773, Stop: 32288, Start Num: 70

Candidate Starts for Arcanine_45:

(54, 32812), (Start: 70 @32773 has 30 MA's), (Start: 90 @32731 has 2 MA's), (108, 32677), (133, 32602), (141, 32578), (143, 32566), (147, 32560), (148, 32557), (187, 32410), (195, 32374), (212, 32317),

Gene: Ariel_116 Start: 62922, Stop: 63554, Start Num: 62

Candidate Starts for Ariel_116:

(17, 62799), (44, 62862), (49, 62877), (Start: 62 @62922 has 5 MA's), (84, 62973), (117, 63084), (159, 63213), (167, 63243), (168, 63255), (179, 63303), (180, 63306),

Gene: Arri_85 Start: 56022, Stop: 55507, Start Num: 61

Candidate Starts for Arri_85:

(Start: 57 @56028 has 1 MA's), (Start: 61 @56022 has 20 MA's), (63, 56010), (Start: 81 @55974 has 3 MA's), (101, 55929), (104, 55914), (128, 55836), (138, 55809), (143, 55788), (150, 55764), (208, 55554), (212, 55542), (218, 55518),

Gene: Auxilium_79 Start: 44205, Stop: 44636, Start Num: 81

Candidate Starts for Auxilium_79:

(Start: 73 @44190 has 1 MA's), (Start: 81 @44205 has 3 MA's), (118, 44313), (166, 44466), (167, 44469),

Gene: Awesomesauce_74 Start: 45209, Stop: 45796, Start Num: 26

Candidate Starts for Awesomesauce_74:

(15, 45155), (Start: 26 @45209 has 9 MA's), (35, 45227), (49, 45260), (Start: 51 @45269 has 4 MA's), (55, 45284), (91, 45365), (109, 45431), (141, 45503), (153, 45554), (166, 45605), (184, 45656), (188, 45680), (201, 45737),

Gene: BENtherdunthat_51 Start: 33462, Stop: 32830, Start Num: 23

Candidate Starts for BENtherdunthat_51:

(Start: 23 @33462 has 4 MA's), (Start: 51 @33399 has 4 MA's), (77, 33342), (110, 33231), (124, 33189), (126, 33183), (139, 33150), (148, 33123), (158, 33072), (160, 33066), (167, 33039), (182, 32994), (201, 32907), (209, 32886), (212, 32880), (223, 32841),

Gene: Beatrix_43 Start: 34176, Stop: 33691, Start Num: 70

Candidate Starts for Beatrix_43:

(54, 34215), (Start: 70 @34176 has 30 MA's), (Start: 90 @34134 has 2 MA's), (108, 34080), (133, 34005), (141, 33981), (143, 33969), (147, 33963), (148, 33960), (154, 33927), (178, 33846), (187, 33813), (203, 33747), (204, 33744), (206, 33735), (212, 33720),

Gene: Beelzebub_55 Start: 29418, Stop: 29891, Start Num: 79

Candidate Starts for Beelzebub_55:

(Start: 79 @29418 has 10 MA's), (Start: 89 @29448 has 2 MA's), (110, 29529), (145, 29619), (164, 29694), (198, 29817), (209, 29856), (212, 29862),

Gene: Belphegor_34 Start: 32088, Stop: 31654, Start Num: 103

Candidate Starts for Belphegor_34:

(48, 32232), (50, 32220), (Start: 61 @32190 has 20 MA's), (Start: 103 @32088 has 1 MA's), (147, 31938), (148, 31935), (166, 31851), (167, 31848), (176, 31815), (198, 31728),

Gene: Bexan_42 Start: 33854, Stop: 33369, Start Num: 70

Candidate Starts for Bexan_42:

(54, 33893), (Start: 70 @33854 has 30 MA's), (Start: 90 @33812 has 2 MA's), (108, 33758), (133, 33683), (141, 33659), (143, 33647), (147, 33641), (148, 33638), (187, 33491), (195, 33455), (212, 33398),

Gene: Bhageatrice_37 Start: 26729, Stop: 27340, Start Num: 79

Candidate Starts for Bhageatrice_37:

(50, 26657), (Start: 79 @26729 has 10 MA's), (113, 26855), (151, 26984), (159, 27020), (164, 27041), (198, 27203), (219, 27278),

Gene: BigPaolini_44 Start: 31801, Stop: 31358, Start Num: 90

Candidate Starts for BigPaolini_44:

(54, 31882), (Start: 70 @31843 has 30 MA's), (Start: 90 @31801 has 2 MA's), (108, 31747), (133, 31672), (141, 31648), (143, 31636), (147, 31630), (148, 31627), (187, 31480), (195, 31444), (212, 31387),

Gene: BillKnuckles_44 Start: 33515, Stop: 33039, Start Num: 72

Candidate Starts for BillKnuckles_44:

(Start: 72 @33515 has 12 MA's), (Start: 81 @33497 has 3 MA's), (88, 33476), (108, 33413), (164, 33239), (187, 33161), (199, 33104), (203, 33095), (204, 33092), (212, 33068),

Gene: BlackSpider_69 Start: 42752, Stop: 43360, Start Num: 25

Candidate Starts for BlackSpider_69:

(Start: 25 @42752 has 2 MA's), (Start: 51 @42815 has 4 MA's), (110, 42986), (141, 43055), (164, 43148), (191, 43241), (195, 43259), (201, 43289),

Gene: Blackbeetle_51 Start: 28464, Stop: 28937, Start Num: 79

Candidate Starts for Blackbeetle_51:

(Start: 79 @28464 has 10 MA's), (Start: 89 @28494 has 2 MA's), (110, 28575), (145, 28665), (164, 28740), (198, 28863), (209, 28902), (212, 28908),

Gene: BluSpix_41 Start: 28937, Stop: 28461, Start Num: 72

Candidate Starts for BluSpix_41:

(Start: 72 @28937 has 12 MA's), (Start: 81 @28919 has 3 MA's), (88, 28898), (108, 28835), (110, 28814), (164, 28661), (187, 28583), (199, 28526), (203, 28517), (204, 28514), (212, 28490),

Gene: BobBob_38 Start: 35578, Stop: 35108, Start Num: 70

Candidate Starts for BobBob_38:

(9, 35776), (12, 35767), (19, 35707), (21, 35698), (41, 35662), (Start: 70 @35578 has 30 MA's), (110, 35452), (119, 35434), (140, 35389), (148, 35371), (156, 35326), (166, 35290), (192, 35212),

Gene: Bones_44 Start: 33339, Stop: 32854, Start Num: 70

Candidate Starts for Bones_44:

(54, 33378), (Start: 70 @33339 has 30 MA's), (Start: 90 @33297 has 2 MA's), (108, 33243), (133, 33168), (141, 33144), (143, 33132), (147, 33126), (148, 33123), (187, 32976), (195, 32940), (212, 32883),

Gene: Brandonk123_42 Start: 36713, Stop: 36243, Start Num: 70

Candidate Starts for Brandonk123_42:

(9, 36911), (12, 36902), (19, 36842), (21, 36833), (41, 36797), (Start: 70 @36713 has 30 MA's), (110, 36587), (119, 36569), (140, 36524), (148, 36506), (156, 36461), (166, 36425), (192, 36347),

Gene: BrutonGaster_75 Start: 52573, Stop: 53064, Start Num: 73

Candidate Starts for BrutonGaster_75:

(Start: 73 @52573 has 1 MA's), (120, 52717), (146, 52774), (148, 52780), (164, 52852), (166, 52861), (183, 52921),

Gene: Charming_41 Start: 36214, Stop: 35744, Start Num: 70

Candidate Starts for Charming_41:

(9, 36412), (12, 36403), (19, 36343), (21, 36334), (41, 36298), (Start: 70 @36214 has 30 MA's), (110, 36088), (119, 36070), (140, 36025), (148, 36007), (156, 35962), (166, 35926), (192, 35848),

Gene: CherryCola_84 Start: 56435, Stop: 55920, Start Num: 61

Candidate Starts for CherryCola_84:

(Start: 57 @56441 has 1 MA's), (Start: 61 @56435 has 20 MA's), (63, 56423), (Start: 81 @56387 has 3 MA's), (101, 56342), (104, 56327), (128, 56249), (138, 56222), (143, 56201), (150, 56177), (208, 55967), (212, 55955), (218, 55931),

Gene: CherryTomatoes_169 Start: 123046, Stop: 122573, Start Num: 78

Candidate Starts for CherryTomatoes_169:

(16, 123214), (27, 123169), (28, 123166), (Start: 78 @123046 has 1 MA's), (88, 123016), (109, 122929), (166, 122755), (186, 122689),

Gene: ChickenDinner_74 Start: 46126, Stop: 46713, Start Num: 26

Candidate Starts for ChickenDinner_74:

(15, 46072), (Start: 26 @46126 has 9 MA's), (35, 46144), (49, 46177), (Start: 51 @46186 has 4 MA's), (55, 46201), (91, 46282), (109, 46348), (141, 46420), (153, 46471), (166, 46522), (184, 46573), (188, 46597), (201, 46654),

Gene: Chidiebere_122 Start: 85918, Stop: 86616, Start Num: 31

Candidate Starts for Chidiebere_122:

(Start: 31 @85918 has 3 MA's), (60, 85990), (69, 86017), (83, 86050), (98, 86080), (112, 86152), (115, 86155), (129, 86188), (130, 86191), (144, 86236), (148, 86245), (166, 86326), (171, 86365), (208, 86509), (211, 86518), (223, 86563), (228, 86608),

Gene: Ciao_44 Start: 32944, Stop: 32501, Start Num: 90

Candidate Starts for Ciao_44:

(18, 33121), (54, 33025), (Start: 70 @32986 has 30 MA's), (Start: 90 @32944 has 2 MA's), (108, 32890), (133, 32815), (141, 32791), (143, 32779), (147, 32773), (148, 32770), (187, 32623), (195, 32587), (212, 32530),

Gene: Clarkson_52 Start: 29146, Stop: 29619, Start Num: 79

Candidate Starts for Clarkson_52:

(Start: 79 @29146 has 10 MA's), (Start: 89 @29176 has 2 MA's), (110, 29257), (145, 29347), (164, 29422), (198, 29545), (209, 29584), (212, 29590),

Gene: CosmicBrownie_77 Start: 44062, Stop: 44670, Start Num: 25

Candidate Starts for CosmicBrownie_77:

(Start: 25 @44062 has 2 MA's), (Start: 51 @44125 has 4 MA's), (141, 44365), (153, 44416), (164, 44458), (191, 44551), (195, 44569), (209, 44620),

Gene: Courthouse_111 Start: 62522, Stop: 63154, Start Num: 62

Candidate Starts for Courthouse_111:

(17, 62399), (44, 62462), (49, 62477), (Start: 62 @62522 has 5 MA's), (84, 62573), (117, 62684), (159, 62813), (167, 62843), (168, 62855), (179, 62903), (180, 62906),

Gene: DeluluLabubu_212 Start: 104650, Stop: 105126, Start Num: 74

Candidate Starts for DeluluLabubu_212:

(Start: 74 @104650 has 6 MA's), (129, 104794), (130, 104797), (149, 104845), (155, 104881), (172, 104959),

Gene: Dexes_44 Start: 33602, Stop: 33117, Start Num: 70

Candidate Starts for Dexes_44:

(54, 33641), (Start: 70 @33602 has 30 MA's), (Start: 90 @33560 has 2 MA's), (108, 33506), (133, 33431), (141, 33407), (143, 33395), (147, 33389), (148, 33386), (187, 33239), (195, 33203), (212, 33146),

Gene: DocMcStuffins_74 Start: 46126, Stop: 46713, Start Num: 26

Candidate Starts for DocMcStuffins_74:

(15, 46072), (Start: 26 @46126 has 9 MA's), (35, 46144), (49, 46177), (Start: 51 @46186 has 4 MA's), (55, 46201), (91, 46282), (109, 46348), (141, 46420), (153, 46471), (166, 46522), (184, 46573), (188, 46597), (201, 46654),

Gene: Egi03_83 Start: 55457, Stop: 54942, Start Num: 61

Candidate Starts for Egi03_83:

(Start: 57 @55463 has 1 MA's), (Start: 61 @55457 has 20 MA's), (63, 55445), (Start: 81 @55409 has 3 MA's), (101, 55364), (104, 55349), (128, 55271), (138, 55244), (143, 55223), (150, 55199), (208, 54989), (212, 54977), (218, 54953),

Gene: Emma1919_210 Start: 103175, Stop: 103651, Start Num: 74

Candidate Starts for Emma1919_210:

(Start: 74 @103175 has 6 MA's), (129, 103319), (130, 103322), (149, 103370), (155, 103406), (172, 103484),

Gene: Evamon_85 Start: 55834, Stop: 55319, Start Num: 61

Candidate Starts for Evamon_85:

(Start: 57 @55840 has 1 MA's), (Start: 61 @55834 has 20 MA's), (63, 55822), (Start: 81 @55786 has 3 MA's), (101, 55741), (104, 55726), (128, 55648), (138, 55621), (143, 55600), (150, 55576), (208, 55366), (212, 55354), (218, 55330),

Gene: EvePickles_81 Start: 47374, Stop: 47805, Start Num: 81

Candidate Starts for EvePickles_81:

(Start: 73 @47359 has 1 MA's), (Start: 81 @47374 has 3 MA's), (166, 47635), (167, 47638),

Gene: EvePickles_79 Start: 46090, Stop: 46698, Start Num: 25

Candidate Starts for EvePickles_79:

(Start: 25 @46090 has 2 MA's), (Start: 51 @46153 has 4 MA's), (141, 46393), (164, 46486), (187, 46564), (191, 46579), (195, 46597), (209, 46648),

Gene: Eyeball_45 Start: 33249, Stop: 32764, Start Num: 70

Candidate Starts for Eyeball_45:

(54, 33288), (Start: 70 @33249 has 30 MA's), (Start: 90 @33207 has 2 MA's), (108, 33153), (133, 33078), (141, 33054), (143, 33042), (147, 33036), (148, 33033), (187, 32886), (195, 32850), (212, 32793),

Gene: Fajezeel_46 Start: 33359, Stop: 32874, Start Num: 70

Candidate Starts for Fajezeel_46:

(18, 33494), (54, 33398), (Start: 70 @33359 has 30 MA's), (Start: 90 @33317 has 2 MA's), (108, 33263), (133, 33188), (141, 33164), (143, 33152), (147, 33146), (148, 33143), (187, 32996), (195, 32960), (212, 32903),

Gene: Fenn_45 Start: 34680, Stop: 34195, Start Num: 70

Candidate Starts for Fenn_45:

(54, 34719), (Start: 70 @34680 has 30 MA's), (Start: 90 @34638 has 2 MA's), (108, 34584), (133, 34509), (141, 34485), (143, 34473), (147, 34467), (148, 34464), (187, 34317), (195, 34281), (212,

34224),

Gene: Finkle_69 Start: 42637, Stop: 43176, Start Num: 56

Candidate Starts for Finkle_69:

(1, 42163), (13, 42487), (Start: 56 @42637 has 1 MA's), (92, 42715), (102, 42733), (132, 42832), (166, 42955), (188, 43015), (208, 43087),

Gene: Fireball_88 Start: 56296, Stop: 55781, Start Num: 61

Candidate Starts for Fireball_88:

(Start: 57 @56302 has 1 MA's), (Start: 61 @56296 has 20 MA's), (63, 56284), (Start: 81 @56248 has 3 MA's), (101, 56203), (104, 56188), (128, 56110), (138, 56083), (143, 56062), (150, 56038), (208, 55828), (212, 55816), (218, 55792),

Gene: Footloose_49 Start: 28880, Stop: 29479, Start Num: 30

Candidate Starts for Footloose_49:

(Start: 25 @28868 has 2 MA's), (Start: 30 @28880 has 1 MA's), (80, 29000), (133, 29150), (136, 29162), (146, 29189), (153, 29225), (194, 29393), (207, 29435),

Gene: Forrest_210 Start: 104141, Stop: 104617, Start Num: 74

Candidate Starts for Forrest_210:

(Start: 74 @104141 has 6 MA's), (129, 104285), (130, 104288), (149, 104336), (155, 104372), (172, 104450),

Gene: Forrest_171 Start: 88900, Stop: 89394, Start Num: 74

Candidate Starts for Forrest_171:

(Start: 74 @88900 has 6 MA's), (124, 89029), (129, 89041), (153, 89119), (156, 89134), (166, 89170), (208, 89323), (221, 89368), (222, 89374),

Gene: Fushigi_42 Start: 30914, Stop: 30438, Start Num: 72

Candidate Starts for Fushigi_42:

(Start: 72 @30914 has 12 MA's), (Start: 81 @30896 has 3 MA's), (88, 30875), (108, 30812), (110, 30791), (164, 30638), (187, 30560), (199, 30503), (203, 30494), (204, 30491), (212, 30467),

Gene: Galactica_36 Start: 26897, Stop: 27583, Start Num: 51

Candidate Starts for Galactica_36:

(2, 26495), (7, 26720), (Start: 51 @26897 has 4 MA's), (Start: 62 @26930 has 5 MA's), (99, 27014), (106, 27059), (109, 27086), (115, 27095), (133, 27140), (134, 27143), (152, 27212), (157, 27236), (160, 27245), (169, 27287), (183, 27323), (189, 27356), (198, 27392), (208, 27428), (224, 27491), (227, 27524), (230, 27557),

Gene: Getalong_54 Start: 36463, Stop: 35831, Start Num: 23

Candidate Starts for Getalong_54:

(Start: 23 @36463 has 4 MA's), (Start: 51 @36400 has 4 MA's), (77, 36343), (110, 36232), (124, 36190), (126, 36184), (139, 36151), (148, 36124), (158, 36073), (160, 36067), (167, 36040), (182, 35995), (201, 35908), (209, 35887), (212, 35881), (223, 35842),

Gene: Gezellig_81 Start: 55680, Stop: 55165, Start Num: 61

Candidate Starts for Gezellig_81:

(Start: 57 @55686 has 1 MA's), (Start: 61 @55680 has 20 MA's), (63, 55668), (Start: 81 @55632 has 3 MA's), (101, 55587), (104, 55572), (128, 55494), (138, 55467), (143, 55446), (150, 55422), (208, 55212), (212, 55200), (218, 55176),

Gene: GiJojo_54 Start: 20818, Stop: 21288, Start Num: 75

Candidate Starts for GiJojo_54:

(Start: 75 @20818 has 2 MA's), (88, 20854), (105, 20896), (146, 21010), (155, 21055), (157, 21064), (158, 21067), (166, 21097), (182, 21163), (197, 21223), (202, 21247), (205, 21256), (210, 21268),

Gene: Goby_56 Start: 42305, Stop: 41778, Start Num: 59

Candidate Starts for Goby_56:

(33, 42374), (Start: 59 @42305 has 3 MA's), (124, 42131), (166, 41987), (181, 41942), (199, 41858), (208, 41834),

Gene: GoongGoong_50 Start: 28396, Stop: 28839, Start Num: 89

Candidate Starts for GoongGoong_50:

(Start: 79 @28366 has 10 MA's), (Start: 89 @28396 has 2 MA's), (110, 28477), (145, 28567), (164, 28642), (198, 28765), (209, 28804), (212, 28810),

Gene: Greg_46 Start: 33359, Stop: 32874, Start Num: 70

Candidate Starts for Greg_46:

(18, 33494), (54, 33398), (Start: 70 @33359 has 30 MA's), (Start: 90 @33317 has 2 MA's), (108, 33263), (133, 33188), (141, 33164), (143, 33152), (147, 33146), (148, 33143), (187, 32996), (195, 32960), (212, 32903),

Gene: GumGum_85 Start: 45863, Stop: 46471, Start Num: 25

Candidate Starts for GumGum_85:

(Start: 25 @45863 has 2 MA's), (Start: 51 @45926 has 4 MA's), (141, 46166), (153, 46217), (164, 46259), (191, 46352), (195, 46370), (209, 46421),

Gene: Hiyaa_37 Start: 28140, Stop: 28826, Start Num: 51

Candidate Starts for Hiyaa_37:

(7, 27963), (47, 28125), (Start: 51 @28140 has 4 MA's), (Start: 62 @28173 has 5 MA's), (99, 28257), (131, 28377), (133, 28383), (160, 28488), (161, 28491), (172, 28539), (183, 28566), (189, 28599), (190, 28602), (198, 28635), (214, 28689), (224, 28734), (226, 28752), (227, 28767), (230, 28800),

Gene: Holliday_49 Start: 33694, Stop: 33062, Start Num: 24

Candidate Starts for Holliday_49:

(Start: 24 @33694 has 2 MA's), (77, 33574), (110, 33463), (124, 33421), (126, 33415), (139, 33382), (148, 33355), (158, 33304), (160, 33298), (167, 33271), (182, 33226), (184, 33220), (201, 33139), (209, 33118), (212, 33112), (223, 33073),

Gene: Huphlepuuff_53 Start: 28951, Stop: 29424, Start Num: 79

Candidate Starts for Huphlepuuff_53:

(Start: 79 @28951 has 10 MA's), (Start: 89 @28981 has 2 MA's), (110, 29062), (145, 29152), (164, 29227), (198, 29350), (209, 29389), (212, 29395),

Gene: ILeeKay_48 Start: 33858, Stop: 33382, Start Num: 72

Candidate Starts for ILeeKay_48:

(Start: 72 @33858 has 12 MA's), (Start: 81 @33840 has 3 MA's), (88, 33819), (108, 33756), (110, 33735), (164, 33582), (187, 33504), (199, 33447), (203, 33438), (204, 33435), (212, 33411),

Gene: IgnatiusPatJac_43 Start: 32882, Stop: 32406, Start Num: 72

Candidate Starts for IgnatiusPatJac_43:

(Start: 72 @32882 has 12 MA's), (Start: 81 @32864 has 3 MA's), (88, 32843), (108, 32780), (110, 32759), (164, 32606), (187, 32528), (199, 32471), (203, 32462), (204, 32459), (212, 32435),

Gene: Jada_168 Start: 87596, Stop: 88090, Start Num: 74

Candidate Starts for Jada_168:

(Start: 74 @87596 has 6 MA's), (124, 87725), (129, 87737), (153, 87815), (156, 87830), (166, 87866), (208, 88019), (221, 88064), (222, 88070),

Gene: Jalebi_69 Start: 49016, Stop: 49408, Start Num: 100

Candidate Starts for Jalebi_69:

(97, 49013), (Start: 100 @49016 has 2 MA's), (146, 49139), (147, 49142), (158, 49196), (166, 49226), (170, 49262), (202, 49376),

Gene: Jinkies_7 Start: 5796, Stop: 6461, Start Num: 20

Candidate Starts for Jinkies_7:

(3, 5598), (5, 5655), (6, 5658), (8, 5700), (Start: 20 @5796 has 1 MA's), (66, 5910), (111, 6057), (148, 6165), (163, 6234), (164, 6240), (175, 6279), (184, 6300), (201, 6384),

Gene: JonJames_73 Start: 49905, Stop: 50405, Start Num: 65

Candidate Starts for JonJames_73:

(Start: 65 @49905 has 2 MA's), (107, 49998), (109, 50019), (130, 50073), (142, 50112), (158, 50169), (166, 50199), (181, 50253), (188, 50286), (208, 50361),

Gene: Kabocha_123 Start: 86731, Stop: 87429, Start Num: 31

Candidate Starts for Kabocha_123:

(Start: 31 @86731 has 3 MA's), (60, 86803), (69, 86830), (83, 86863), (98, 86893), (112, 86965), (115, 86968), (129, 87001), (130, 87004), (144, 87049), (148, 87058), (166, 87139), (171, 87178), (208, 87322), (211, 87331), (223, 87376), (228, 87421),

Gene: Keanu_37 Start: 27981, Stop: 28685, Start Num: 51

Candidate Starts for Keanu_37:

(7, 27804), (21, 27912), (Start: 51 @27981 has 4 MA's), (64, 28023), (95, 28092), (109, 28170), (125, 28218), (127, 28221), (134, 28239), (152, 28308), (153, 28314), (159, 28338), (160, 28341), (200, 28503), (208, 28524), (213, 28539), (214, 28542), (216, 28551), (224, 28587), (227, 28620), (229, 28629), (230, 28662),

Gene: Kenna_50 Start: 34206, Stop: 33574, Start Num: 23

Candidate Starts for Kenna_50:

(Start: 23 @34206 has 4 MA's), (Start: 51 @34143 has 4 MA's), (77, 34086), (110, 33975), (124, 33933), (126, 33927), (139, 33894), (148, 33867), (158, 33816), (160, 33810), (167, 33783), (182, 33738), (201, 33651), (209, 33630), (212, 33624), (223, 33585),

Gene: KimmyK_83 Start: 56127, Stop: 55612, Start Num: 61

Candidate Starts for KimmyK_83:

(Start: 57 @56133 has 1 MA's), (Start: 61 @56127 has 20 MA's), (63, 56115), (Start: 81 @56079 has 3 MA's), (101, 56034), (104, 56019), (128, 55941), (138, 55914), (143, 55893), (150, 55869), (208, 55659), (212, 55647), (218, 55623),

Gene: Kokushibo_38 Start: 28090, Stop: 28776, Start Num: 51

Candidate Starts for Kokushibo_38:

(7, 27913), (Start: 51 @28090 has 4 MA's), (Start: 62 @28123 has 5 MA's), (99, 28207), (131, 28327), (133, 28333), (160, 28438), (161, 28441), (172, 28489), (183, 28516), (189, 28549), (190, 28552), (198, 28585), (214, 28639), (224, 28684), (227, 28717), (230, 28750),

Gene: Kykar_44 Start: 32934, Stop: 32458, Start Num: 72

Candidate Starts for Kykar_44:

(Start: 72 @32934 has 12 MA's), (Start: 81 @32916 has 3 MA's), (88, 32895), (108, 32832), (110, 32811), (164, 32658), (187, 32580), (199, 32523), (203, 32514), (204, 32511), (212, 32487),

Gene: Lasker_82 Start: 46302, Stop: 46910, Start Num: 25

Candidate Starts for Lasker_82:

(Start: 25 @46302 has 2 MA's), (Start: 51 @46365 has 4 MA's), (141, 46605), (153, 46656), (164, 46698), (191, 46791), (195, 46809), (209, 46860),

Gene: Licorice_47 Start: 34445, Stop: 33960, Start Num: 70

Candidate Starts for Licorice_47:

(54, 34484), (Start: 70 @34445 has 30 MA's), (Start: 90 @34403 has 2 MA's), (108, 34349), (133, 34274), (141, 34250), (143, 34238), (147, 34232), (148, 34229), (187, 34082), (195, 34046), (212, 33989),

Gene: Lika_55 Start: 42316, Stop: 41774, Start Num: 59

Candidate Starts for Lika_55:

(Start: 59 @42316 has 3 MA's), (166, 41986), (199, 41857),

Gene: Lilbit_50 Start: 29147, Stop: 29620, Start Num: 79

Candidate Starts for Lilbit_50:

(Start: 79 @29147 has 10 MA's), (Start: 89 @29177 has 2 MA's), (110, 29258), (145, 29348), (164, 29423), (198, 29546), (209, 29585), (212, 29591),

Gene: LittleLaf_51 Start: 28906, Stop: 29349, Start Num: 89

Candidate Starts for LittleLaf_51:

(Start: 79 @28876 has 10 MA's), (Start: 89 @28906 has 2 MA's), (110, 28987), (145, 29077), (164, 29152), (198, 29275), (209, 29314), (212, 29320),

Gene: Love_44 Start: 37647, Stop: 37177, Start Num: 70

Candidate Starts for Love_44:

(9, 37845), (12, 37836), (19, 37776), (21, 37767), (41, 37731), (Start: 70 @37647 has 30 MA's), (110, 37521), (119, 37503), (140, 37458), (148, 37440), (156, 37395), (166, 37359), (192, 37281),

Gene: Lutum_51 Start: 34206, Stop: 33574, Start Num: 23

Candidate Starts for Lutum_51:

(Start: 23 @34206 has 4 MA's), (Start: 51 @34143 has 4 MA's), (77, 34086), (110, 33975), (124, 33933), (126, 33927), (139, 33894), (148, 33867), (158, 33816), (160, 33810), (167, 33783), (182, 33738), (201, 33651), (209, 33630), (212, 33624), (223, 33585),

Gene: Lysidious_72 Start: 45013, Stop: 45621, Start Num: 22

Candidate Starts for Lysidious_72:

(Start: 22 @45013 has 2 MA's), (36, 45040), (Start: 51 @45079 has 4 MA's), (Start: 76 @45139 has 1 MA's), (114, 45256), (116, 45262), (147, 45343), (148, 45346), (194, 45520), (201, 45553), (220, 45604),

Gene: Marco3_46 Start: 33679, Stop: 33203, Start Num: 72

Candidate Starts for Marco3_46:

(Start: 72 @33679 has 12 MA's), (Start: 81 @33661 has 3 MA's), (88, 33640), (108, 33577), (110, 33556), (164, 33403), (187, 33325), (199, 33268), (203, 33259), (204, 33256), (212, 33232),

Gene: Marge_44 Start: 33477, Stop: 32992, Start Num: 70

Candidate Starts for Marge_44:

(54, 33516), (Start: 70 @33477 has 30 MA's), (Start: 90 @33435 has 2 MA's), (108, 33381), (133, 33306), (141, 33282), (143, 33270), (147, 33264), (148, 33261), (187, 33114), (195, 33078), (212, 33021),

Gene: Mbo2_93 Start: 66190, Stop: 65546, Start Num: 38

Candidate Starts for Mbo2_93:

(32, 66199), (38, 66190), (53, 66142), (71, 66094), (85, 66058), (147, 65854), (165, 65770), (185, 65671), (186, 65668), (206, 65590), (215, 65566),

Gene: Megiddo_61 Start: 41199, Stop: 41795, Start Num: 26

Candidate Starts for Megiddo_61:

(4, 41016), (17, 41172), (Start: 26 @41199 has 9 MA's), (39, 41220), (Start: 51 @41256 has 4 MA's), (55, 41271), (Start: 76 @41316 has 1 MA's), (93, 41355), (164, 41595), (174, 41634), (186, 41670), (201, 41736), (212, 41763),

Gene: MiaZeal_116 Start: 63594, Stop: 64151, Start Num: 62

Candidate Starts for MiaZeal_116:

(44, 63534), (49, 63549), (Start: 62 @63594 has 5 MA's), (84, 63645), (117, 63756), (159, 63885), (167, 63915), (168, 63927), (179, 63975), (180, 63978),

Gene: Mikronejon_117 Start: 85340, Stop: 85966, Start Num: 60

Candidate Starts for Mikronejon_117:

(Start: 31 @85268 has 3 MA's), (60, 85340), (69, 85367), (83, 85400), (98, 85430), (112, 85502), (115, 85505), (129, 85538), (130, 85541), (144, 85586), (148, 85595), (166, 85676), (171, 85715), (208, 85859), (211, 85868), (223, 85913), (228, 85958),

Gene: Misha28_72 Start: 45214, Stop: 45801, Start Num: 26

Candidate Starts for Misha28_72:

(15, 45160), (Start: 26 @45214 has 9 MA's), (35, 45232), (49, 45265), (Start: 51 @45274 has 4 MA's), (55, 45289), (91, 45370), (109, 45436), (141, 45508), (153, 45559), (166, 45610), (184, 45661), (188, 45685), (201, 45742),

Gene: Naira_45 Start: 34727, Stop: 34242, Start Num: 70

Candidate Starts for Naira_45:

(54, 34766), (Start: 70 @34727 has 30 MA's), (Start: 90 @34685 has 2 MA's), (108, 34631), (133, 34556), (141, 34532), (143, 34520), (147, 34514), (148, 34511), (187, 34364), (195, 34328), (212, 34271),

Gene: Niza_46 Start: 34104, Stop: 33619, Start Num: 70

Candidate Starts for Niza_46:

(54, 34143), (Start: 70 @34104 has 30 MA's), (Start: 90 @34062 has 2 MA's), (108, 34008), (133, 33933), (141, 33909), (143, 33897), (147, 33891), (148, 33888), (187, 33741), (195, 33705), (212, 33648),

Gene: Nordenberg_35 Start: 35840, Stop: 35370, Start Num: 70

Candidate Starts for Nordenberg_35:

(9, 36038), (12, 36029), (19, 35969), (21, 35960), (41, 35924), (Start: 70 @35840 has 30 MA's), (110, 35714), (119, 35696), (140, 35651), (148, 35633), (156, 35588), (166, 35552), (192, 35474),

Gene: Paries_43 Start: 37309, Stop: 36839, Start Num: 70

Candidate Starts for Paries_43:

(9, 37507), (12, 37498), (19, 37438), (21, 37429), (41, 37393), (Start: 70 @37309 has 30 MA's), (110, 37183), (119, 37165), (140, 37120), (148, 37102), (156, 37057), (166, 37021), (192, 36943),

Gene: Petruccio_44 Start: 32947, Stop: 32471, Start Num: 72

Candidate Starts for Petruccio_44:

(Start: 72 @32947 has 12 MA's), (Start: 81 @32929 has 3 MA's), (88, 32908), (108, 32845), (110, 32824), (164, 32671), (187, 32593), (199, 32536), (203, 32527), (204, 32524), (212, 32500),

Gene: Phayonce_65 Start: 43286, Stop: 43876, Start Num: 29

Candidate Starts for Phayonce_65:

(Start: 29 @43286 has 1 MA's), (37, 43298), (48, 43322), (Start: 61 @43364 has 20 MA's), (93, 43436), (164, 43676), (174, 43715), (186, 43751), (201, 43817), (212, 43844),

Gene: Phlop_82 Start: 55730, Stop: 55215, Start Num: 61

Candidate Starts for Phlop_82:

(Start: 57 @55736 has 1 MA's), (Start: 61 @55730 has 20 MA's), (63, 55718), (Start: 81 @55682 has 3 MA's), (101, 55637), (104, 55622), (128, 55544), (138, 55517), (143, 55496), (150, 55472), (208, 55262), (212, 55250), (218, 55226),

Gene: Phrank15_85 Start: 46952, Stop: 47386, Start Num: 81

Candidate Starts for Phrank15_85:

(Start: 73 @46937 has 1 MA's), (Start: 81 @46952 has 3 MA's), (99, 46988), (147, 47129), (166, 47213), (167, 47216),

Gene: Phredrick_212 Start: 102971, Stop: 103447, Start Num: 74

Candidate Starts for Phredrick_212:

(Start: 74 @102971 has 6 MA's), (129, 103115), (130, 103118), (149, 103166), (155, 103202), (172, 103280),

Gene: PinkCoffee_86 Start: 55594, Stop: 55079, Start Num: 61

Candidate Starts for PinkCoffee_86:

(Start: 57 @55600 has 1 MA's), (Start: 61 @55594 has 20 MA's), (63, 55582), (Start: 81 @55546 has 3 MA's), (101, 55501), (104, 55486), (128, 55408), (138, 55381), (143, 55360), (150, 55336), (208, 55126), (212, 55114), (218, 55090),

Gene: Pippin_46 Start: 33403, Stop: 32918, Start Num: 70

Candidate Starts for Pippin_46:

(18, 33538), (54, 33442), (Start: 70 @33403 has 30 MA's), (Start: 90 @33361 has 2 MA's), (108, 33307), (133, 33232), (141, 33208), (143, 33196), (147, 33190), (148, 33187), (187, 33040), (195, 33004), (212, 32947),

Gene: Poise_51 Start: 28464, Stop: 28937, Start Num: 79

Candidate Starts for Poise_51:

(Start: 79 @28464 has 10 MA's), (Start: 89 @28494 has 2 MA's), (110, 28575), (145, 28665), (164, 28740), (198, 28863), (209, 28902), (212, 28908),

Gene: Portcullis_85 Start: 55736, Stop: 55221, Start Num: 61

Candidate Starts for Portcullis_85:

(Start: 57 @55742 has 1 MA's), (Start: 61 @55736 has 20 MA's), (63, 55724), (Start: 81 @55688 has 3 MA's), (101, 55643), (104, 55628), (128, 55550), (138, 55523), (143, 55502), (150, 55478), (208, 55268), (212, 55256), (218, 55232),

Gene: Pringar_51 Start: 28752, Stop: 29225, Start Num: 79

Candidate Starts for Pringar_51:

(Start: 79 @28752 has 10 MA's), (Start: 89 @28782 has 2 MA's), (110, 28863), (145, 28953), (164, 29028), (198, 29151), (209, 29190), (212, 29196),

Gene: ProMouse_44 Start: 33305, Stop: 32802, Start Num: 61

Candidate Starts for ProMouse_44:

(52, 33329), (Start: 61 @33305 has 20 MA's), (88, 33236), (99, 33215), (110, 33164), (115, 33158), (164, 33011), (203, 32867), (212, 32840),

Gene: PullumCavea_83 Start: 55907, Stop: 55392, Start Num: 61

Candidate Starts for PullumCavea_83:

(Start: 57 @55913 has 1 MA's), (Start: 61 @55907 has 20 MA's), (63, 55895), (Start: 81 @55859 has 3 MA's), (101, 55814), (104, 55799), (128, 55721), (138, 55694), (143, 55673), (150, 55649), (208, 55439), (212, 55427), (218, 55403),

Gene: Puppet_45 Start: 33423, Stop: 33034, Start Num: 108

Candidate Starts for Puppet_45:

(54, 33558), (Start: 70 @33519 has 30 MA's), (Start: 90 @33477 has 2 MA's), (108, 33423), (133, 33348), (141, 33324), (143, 33312), (147, 33306), (148, 33303), (187, 33156), (195, 33120), (212, 33063),

Gene: Raela_51 Start: 29019, Stop: 29492, Start Num: 79

Candidate Starts for Raela_51:

(Start: 79 @29019 has 10 MA's), (Start: 89 @29049 has 2 MA's), (110, 29130), (145, 29220), (164, 29295), (198, 29418), (209, 29457), (212, 29463),

Gene: Rajelicia_45 Start: 33435, Stop: 32950, Start Num: 70

Candidate Starts for Rajelicia_45:

(54, 33474), (Start: 70 @33435 has 30 MA's), (Start: 90 @33393 has 2 MA's), (108, 33339), (133, 33264), (141, 33240), (143, 33228), (147, 33222), (148, 33219), (187, 33072), (195, 33036), (212, 32979),

Gene: Rofo_41 Start: 36635, Stop: 36165, Start Num: 70

Candidate Starts for Rofo_41:

(9, 36833), (12, 36824), (19, 36764), (21, 36755), (41, 36719), (Start: 70 @36635 has 30 MA's), (110, 36509), (119, 36491), (140, 36446), (148, 36428), (156, 36383), (166, 36347), (192, 36269),

Gene: RogerDodger_88 Start: 56495, Stop: 55980, Start Num: 61

Candidate Starts for RogerDodger_88:

(Start: 57 @56501 has 1 MA's), (Start: 61 @56495 has 20 MA's), (63, 56483), (Start: 81 @56447 has 3 MA's), (101, 56402), (104, 56387), (128, 56309), (138, 56282), (143, 56261), (150, 56237), (208, 56027), (212, 56015), (218, 55991),

Gene: Ruotula_47 Start: 34572, Stop: 34078, Start Num: 70

Candidate Starts for Ruotula_47:

(54, 34611), (Start: 70 @34572 has 30 MA's), (Start: 90 @34530 has 2 MA's), (108, 34476), (133, 34401), (141, 34377), (143, 34365), (147, 34359), (148, 34356), (187, 34200), (195, 34164), (212, 34107),

Gene: SCentae_166 Start: 121636, Stop: 122217, Start Num: 40

Candidate Starts for SCentae_166:

(Start: 40 @121636 has 1 MA's), (58, 121693), (130, 121873), (177, 122059), (194, 122125),

Gene: Sagefire_47 Start: 34321, Stop: 33836, Start Num: 70

Candidate Starts for Sagefire_47:

(54, 34360), (Start: 70 @34321 has 30 MA's), (Start: 90 @34279 has 2 MA's), (108, 34225), (133, 34150), (141, 34126), (143, 34114), (147, 34108), (148, 34105), (187, 33958), (195, 33922), (212, 33865),

Gene: Salvador_85 Start: 55832, Stop: 55317, Start Num: 61

Candidate Starts for Salvador_85:

(Start: 57 @55838 has 1 MA's), (Start: 61 @55832 has 20 MA's), (63, 55820), (Start: 81 @55784 has 3 MA's), (101, 55739), (104, 55724), (128, 55646), (138, 55619), (143, 55598), (150, 55574), (208, 55364), (212, 55352), (218, 55328),

Gene: Sampudon_70 Start: 49016, Stop: 49408, Start Num: 100

Candidate Starts for Sampudon_70:

(97, 49013), (Start: 100 @49016 has 2 MA's), (146, 49139), (147, 49142), (158, 49196), (166, 49226), (170, 49262), (202, 49376),

Gene: Savbucketdawg_80 Start: 55174, Stop: 54659, Start Num: 61

Candidate Starts for Savbucketdawg_80:

(Start: 57 @55180 has 1 MA's), (Start: 61 @55174 has 20 MA's), (63, 55162), (Start: 81 @55126 has 3 MA's), (101, 55081), (104, 55066), (128, 54988), (138, 54961), (143, 54940), (150, 54916), (208, 54706), (212, 54694), (218, 54670),

Gene: Schomber_120 Start: 85119, Stop: 85817, Start Num: 31

Candidate Starts for Schomber_120:

(Start: 31 @85119 has 3 MA's), (60, 85191), (69, 85218), (83, 85251), (98, 85281), (112, 85353), (115, 85356), (129, 85389), (130, 85392), (144, 85437), (148, 85446), (166, 85527), (171, 85566), (208, 85710), (211, 85719), (223, 85764), (228, 85809),

Gene: Seanderson_46 Start: 33923, Stop: 33447, Start Num: 72

Candidate Starts for Seanderson_46:

(Start: 72 @33923 has 12 MA's), (Start: 81 @33905 has 3 MA's), (88, 33884), (108, 33821), (110, 33800), (164, 33647), (187, 33569), (199, 33512), (203, 33503), (204, 33500), (212, 33476),

Gene: Shinji_84 Start: 55913, Stop: 55398, Start Num: 61

Candidate Starts for Shinji_84:

(Start: 57 @55919 has 1 MA's), (Start: 61 @55913 has 20 MA's), (63, 55901), (Start: 81 @55865 has 3 MA's), (101, 55820), (104, 55805), (128, 55727), (138, 55700), (143, 55679), (150, 55655), (208, 55445), (212, 55433), (218, 55409),

Gene: SkinnyPete_53 Start: 35995, Stop: 36582, Start Num: 26

Candidate Starts for SkinnyPete_53:

(15, 35941), (Start: 26 @35995 has 9 MA's), (35, 36013), (49, 36046), (Start: 51 @36055 has 4 MA's), (55, 36070), (91, 36151), (109, 36217), (141, 36289), (153, 36340), (166, 36391), (184, 36442), (188, 36466), (201, 36523),

Gene: Slagathor_46 Start: 33360, Stop: 32875, Start Num: 70

Candidate Starts for Slagathor_46:

(54, 33399), (Start: 70 @33360 has 30 MA's), (Start: 90 @33318 has 2 MA's), (108, 33264), (133, 33189), (141, 33165), (143, 33153), (147, 33147), (148, 33144), (187, 32997), (195, 32961), (212, 32904),

Gene: Smairt_46 Start: 33659, Stop: 33174, Start Num: 70

Candidate Starts for Smairt_46:

(54, 33698), (Start: 70 @33659 has 30 MA's), (Start: 90 @33617 has 2 MA's), (108, 33563), (133, 33488), (141, 33464), (143, 33452), (147, 33446), (148, 33443), (187, 33296), (195, 33260), (212, 33203),

Gene: SmokingBunny_86 Start: 56828, Stop: 56313, Start Num: 61

Candidate Starts for SmokingBunny_86:

(Start: 57 @56834 has 1 MA's), (Start: 61 @56828 has 20 MA's), (63, 56816), (Start: 81 @56780 has 3 MA's), (101, 56735), (104, 56720), (128, 56642), (138, 56615), (143, 56594), (150, 56570), (208, 56360), (212, 56348), (218, 56324),

Gene: Spocter_36 Start: 28063, Stop: 28749, Start Num: 51

Candidate Starts for Spocter_36:

(7, 27886), (Start: 51 @28063 has 4 MA's), (Start: 62 @28096 has 5 MA's), (99, 28180), (131, 28300), (133, 28306), (160, 28411), (161, 28414), (172, 28462), (183, 28489), (189, 28522), (190, 28525), (198, 28558), (214, 28612), (224, 28657), (227, 28690), (230, 28723),

Gene: Spooky_106 Start: 55742, Stop: 56233, Start Num: 87

Candidate Starts for Spooky_106:

(11, 55508), (14, 55517), (Start: 24 @55583 has 2 MA's), (Start: 31 @55598 has 3 MA's), (45, 55625), (52, 55652), (Start: 87 @55742 has 1 MA's), (121, 55859), (122, 55862), (123, 55865), (153, 55967), (164, 56009), (166, 56018), (206, 56180), (217, 56210),

Gene: Squint_114 Start: 63713, Stop: 64345, Start Num: 62

Candidate Starts for Squint_114:

(17, 63590), (44, 63653), (49, 63668), (Start: 62 @63713 has 5 MA's), (84, 63764), (117, 63875), (159, 64004), (167, 64034), (168, 64046), (179, 64094), (180, 64097),

Gene: Stewart25555_169 Start: 117773, Stop: 118273, Start Num: 94

Candidate Starts for Stewart25555_169:

(34, 117620), (54, 117677), (94, 117773), (129, 117902), (135, 117917), (137, 117926), (148, 117959), (160, 118022), (196, 118193),

Gene: StrongArm_43 Start: 33982, Stop: 33497, Start Num: 70

Candidate Starts for StrongArm_43:

(54, 34021), (Start: 70 @33982 has 30 MA's), (Start: 90 @33940 has 2 MA's), (108, 33886), (133, 33811), (141, 33787), (143, 33775), (147, 33769), (148, 33766), (187, 33619), (195, 33583), (212, 33526),

Gene: Sunfish_75 Start: 46858, Stop: 46316, Start Num: 76

Candidate Starts for Sunfish_75:

(Start: 76 @46858 has 1 MA's), (86, 46828), (173, 46537), (187, 46489), (193, 46465),

Gene: Superphikiman_113 Start: 62804, Stop: 63436, Start Num: 62

Candidate Starts for Superphikiman_113:

(17, 62681), (44, 62744), (49, 62759), (Start: 62 @62804 has 5 MA's), (84, 62855), (117, 62966), (159, 63095), (167, 63125), (168, 63137), (179, 63185), (180, 63188),

Gene: Tangent_41 Start: 36226, Stop: 35756, Start Num: 70

Candidate Starts for Tangent_41:

(9, 36424), (12, 36415), (19, 36355), (21, 36346), (41, 36310), (Start: 70 @36226 has 30 MA's), (110, 36100), (119, 36082), (140, 36037), (148, 36019), (156, 35974), (166, 35938), (192, 35860),

Gene: TheloniousMonk_45 Start: 34368, Stop: 33883, Start Num: 70

Candidate Starts for TheloniousMonk_45:

(54, 34407), (Start: 70 @34368 has 30 MA's), (Start: 90 @34326 has 2 MA's), (108, 34272), (133, 34197), (141, 34173), (143, 34161), (147, 34155), (148, 34152), (187, 34005), (195, 33969), (212, 33912),

Gene: ThulaThula_69 Start: 44706, Stop: 45302, Start Num: 26

Candidate Starts for ThulaThula_69:

(10, 44622), (17, 44679), (Start: 26 @44706 has 9 MA's), (39, 44727), (Start: 51 @44763 has 4 MA's), (55, 44778), (Start: 76 @44823 has 1 MA's), (93, 44862), (164, 45102), (174, 45141), (186, 45177), (201, 45243), (212, 45270),

Gene: TillyBobJoe_83 Start: 55714, Stop: 55199, Start Num: 61

Candidate Starts for TillyBobJoe_83:

(Start: 57 @55720 has 1 MA's), (Start: 61 @55714 has 20 MA's), (63, 55702), (Start: 81 @55666 has 3 MA's), (101, 55621), (104, 55606), (128, 55528), (138, 55501), (143, 55480), (150, 55456), (208, 55246), (212, 55234), (218, 55210),

Gene: Togo_85 Start: 56828, Stop: 56313, Start Num: 61

Candidate Starts for Togo_85:

(Start: 57 @56834 has 1 MA's), (Start: 61 @56828 has 20 MA's), (63, 56816), (Start: 81 @56780 has 3 MA's), (101, 56735), (104, 56720), (128, 56642), (138, 56615), (143, 56594), (150, 56570), (208, 56360), (212, 56348), (218, 56324),

Gene: Toma_56 Start: 42308, Stop: 41778, Start Num: 59

Candidate Starts for Toma_56:

(33, 42377), (Start: 59 @42308 has 3 MA's), (124, 42131), (166, 41987), (181, 41942), (199, 41858), (208, 41834),

Gene: TootsiePop_72 Start: 45214, Stop: 45801, Start Num: 26

Candidate Starts for TootsiePop_72:

(15, 45160), (Start: 26 @45214 has 9 MA's), (35, 45232), (49, 45265), (Start: 51 @45274 has 4 MA's), (55, 45289), (91, 45370), (109, 45436), (141, 45508), (153, 45559), (166, 45610), (184, 45661), (188, 45685), (201, 45742),

Gene: Trouble_45 Start: 34048, Stop: 33572, Start Num: 72

Candidate Starts for Trouble_45:

(Start: 72 @34048 has 12 MA's), (Start: 81 @34030 has 3 MA's), (88, 34009), (108, 33946), (110, 33925), (164, 33772), (187, 33694), (199, 33637), (203, 33628), (204, 33625), (212, 33601),

Gene: Twister6_84 Start: 55177, Stop: 54662, Start Num: 61

Candidate Starts for Twister6_84:

(Start: 57 @55183 has 1 MA's), (Start: 61 @55177 has 20 MA's), (63, 55165), (Start: 81 @55129 has 3 MA's), (101, 55084), (104, 55069), (128, 54991), (138, 54964), (143, 54943), (150, 54919), (208, 54709), (212, 54697), (218, 54673),

Gene: Valary_86 Start: 56820, Stop: 56305, Start Num: 61

Candidate Starts for Valary_86:

(Start: 57 @56826 has 1 MA's), (Start: 61 @56820 has 20 MA's), (63, 56808), (Start: 81 @56772 has 3 MA's), (101, 56727), (104, 56712), (128, 56634), (138, 56607), (143, 56586), (150, 56562), (208, 56352), (212, 56340), (218, 56316),

Gene: VanDeWege_87 Start: 56351, Stop: 55830, Start Num: 57

Candidate Starts for VanDeWege_87:

(Start: 57 @56351 has 1 MA's), (Start: 61 @56345 has 20 MA's), (63, 56333), (Start: 81 @56297 has 3 MA's), (101, 56252), (104, 56237), (128, 56159), (138, 56132), (143, 56111), (150, 56087), (208, 55877), (212, 55865), (218, 55841),

Gene: VasuNzinga_51 Start: 28326, Stop: 28799, Start Num: 79

Candidate Starts for VasuNzinga_51:

(Start: 79 @28326 has 10 MA's), (Start: 89 @28356 has 2 MA's), (110, 28437), (145, 28527), (164, 28602), (198, 28725), (209, 28764), (212, 28770),

Gene: Vitus_38 Start: 31088, Stop: 31606, Start Num: 67

Candidate Starts for Vitus_38:

(Start: 67 @31088 has 1 MA's), (135, 31262), (186, 31457),

Gene: Vivi2_43 Start: 37381, Stop: 36914, Start Num: 68

Candidate Starts for Vivi2_43:

(42, 37450), (46, 37441), (Start: 68 @37381 has 1 MA's), (110, 37258), (119, 37240), (140, 37195), (148, 37177), (156, 37132), (166, 37096), (192, 37018),

Gene: Walrus_68 Start: 43422, Stop: 44057, Start Num: 22

Candidate Starts for Walrus_68:

(Start: 22 @43422 has 2 MA's), (43, 43458), (Start: 51 @43485 has 4 MA's), (Start: 76 @43545 has 1 MA's), (114, 43662), (116, 43668), (186, 43899), (225, 44043),

Gene: WilliamBoone_124 Start: 68689, Stop: 69156, Start Num: 82

Candidate Starts for WilliamBoone_124:

(21, 68554), (Start: 82 @68689 has 1 MA's), (96, 68722), (148, 68878), (166, 68962), (188, 69028), (209, 69106),

Gene: Wizard_80 Start: 55680, Stop: 55165, Start Num: 61

Candidate Starts for Wizard_80:

(Start: 57 @55686 has 1 MA's), (Start: 61 @55680 has 20 MA's), (63, 55668), (Start: 81 @55632 has 3 MA's), (101, 55587), (104, 55572), (128, 55494), (138, 55467), (143, 55446), (150, 55422), (208, 55212), (212, 55200), (218, 55176),

Gene: Yvonnetastic_71 Start: 47446, Stop: 47946, Start Num: 65

Candidate Starts for Yvonnetastic_71:

(Start: 65 @47446 has 2 MA's), (107, 47539), (109, 47560), (130, 47614), (142, 47653), (158, 47710), (166, 47740), (181, 47794), (188, 47827), (208, 47902),