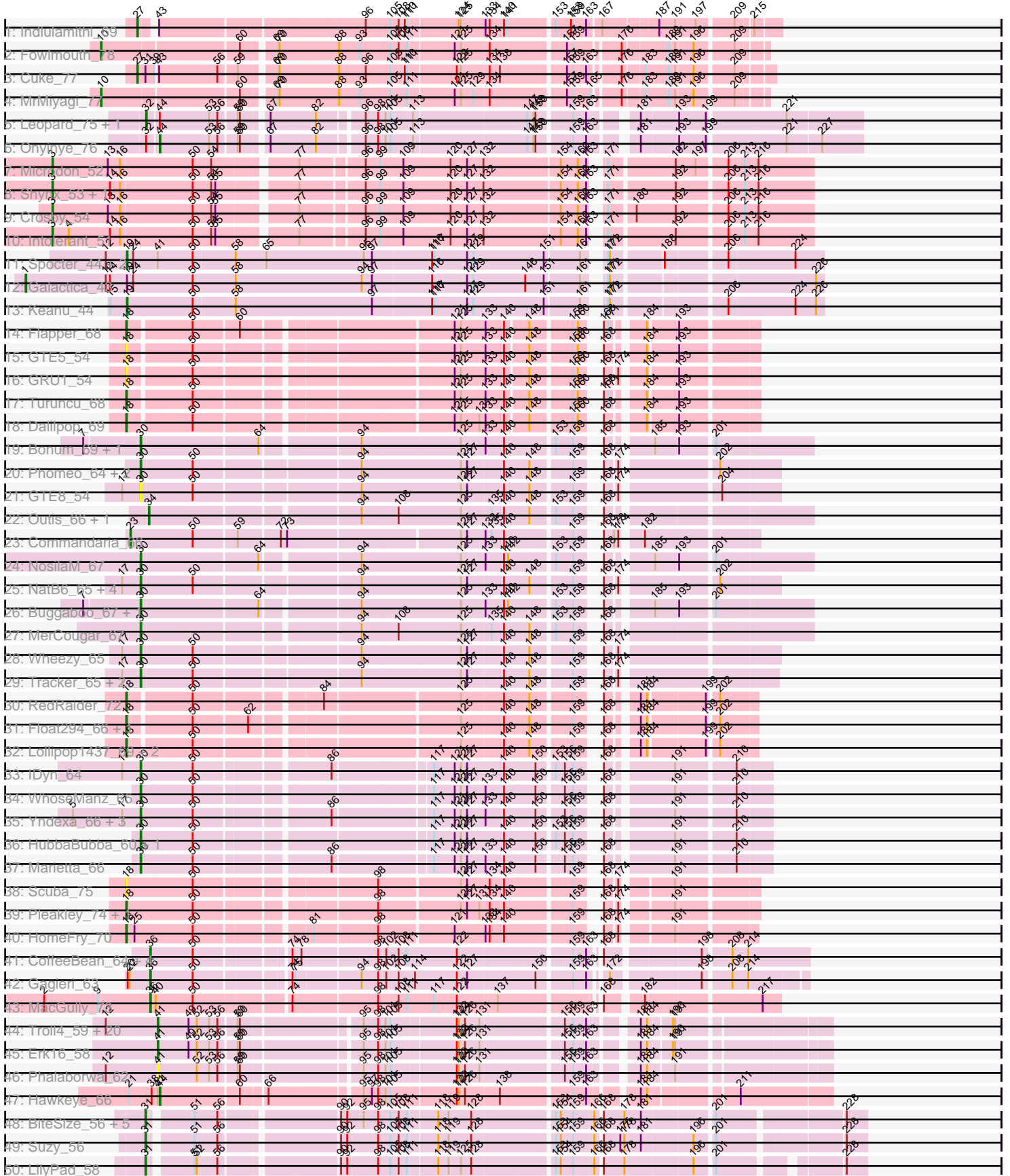
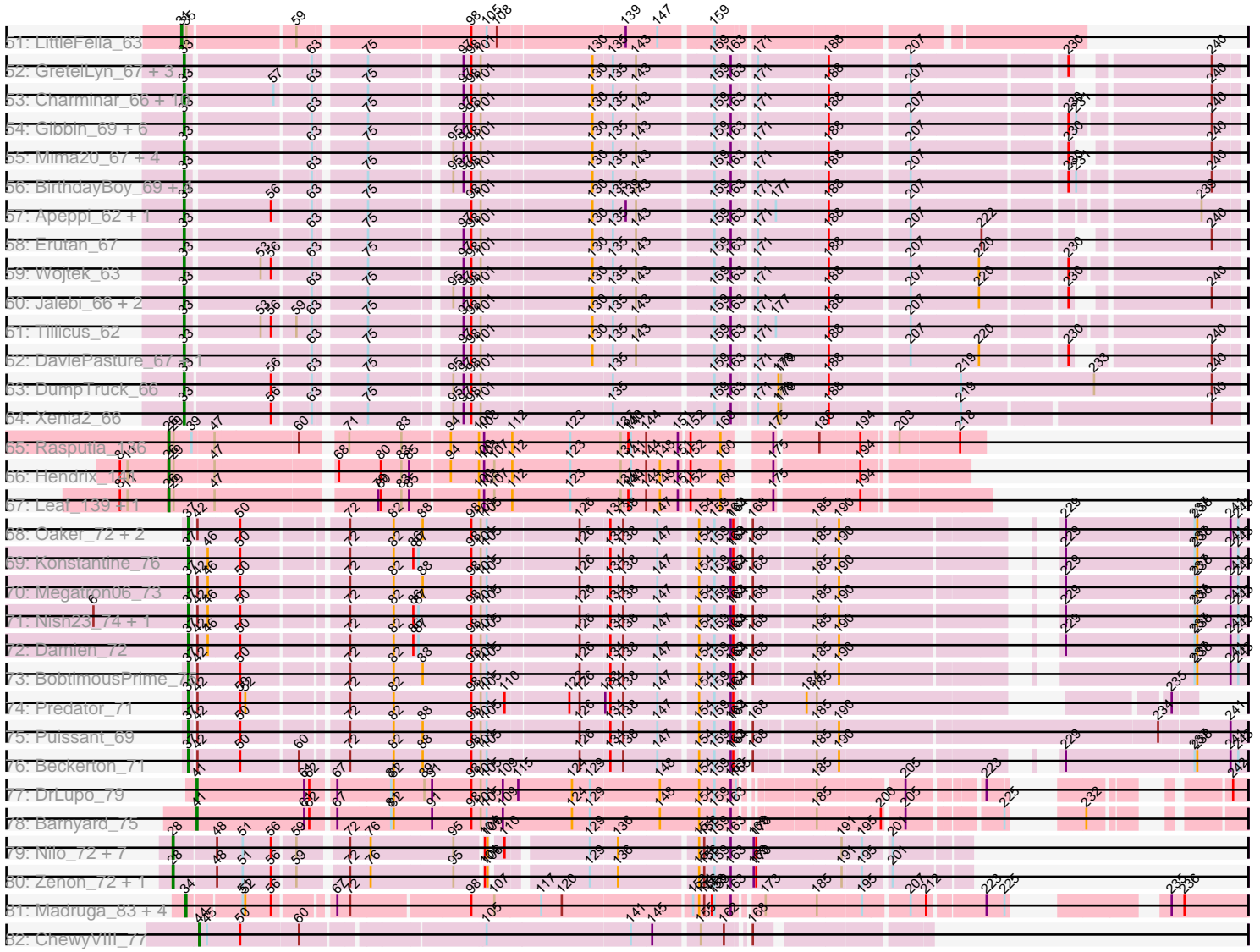


Pham 311266



Pham 311266



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 311266 Report

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

Pham number 311266 has 181 members, 15 are drafts.

Phages represented in each track:

- Track 1 : Indlulamithi_69
- Track 2 : Fowlmouth_78
- Track 3 : Cuke_77
- Track 4 : MrMiyagi_77
- Track 5 : Leopard_75, Aikoy_76
- Track 6 : Onyinye_76
- Track 7 : Microdon_52
- Track 8 : Shynx_53, Stuff_53
- Track 9 : Crosby_54
- Track 10 : Intolerant_51
- Track 11 : Spocter_44, Kokushibo_46, Hiyaa_45
- Track 12 : Galactica_43
- Track 13 : Keanu_44
- Track 14 : Flapper_68
- Track 15 : GTE5_54
- Track 16 : GRU1_54
- Track 17 : Turuncu_68
- Track 18 : Dalilpop_69
- Track 19 : Bonum_69, Kabluna_68
- Track 20 : Phomeo_64, Jifall16_64, KidneyBean_65
- Track 21 : GTE8_54
- Track 22 : Outis_66, StarStruck_66
- Track 23 : Commandaria_66
- Track 24 : NosilaM_67
- Track 25 : NatB6_65, Emianna_65, Kurt_65, NovumRegina_65, GrootJr_67
- Track 26 : Buggaboo_67, SuperSulley_67
- Track 27 : MerCougar_67
- Track 28 : Wheezy_65
- Track 29 : Tracker_65, Arti_64, Foxboro_66
- Track 30 : RedRaider_72
- Track 31 : Float294_66, Skysand_67
- Track 32 : Lollipop1437_69, Ennea_72, Patio_67
- Track 33 : IDyn_64
- Track 34 : WhoseManz_65
- Track 35 : Yndexa_66, Pemberton_68, Sukkupi_66, BiPauneto_68
- Track 36 : HubbaBubba_60, NadineRae_65
- Track 37 : Marietta_66

- Track 38 : Scuba_75
- Track 39 : Pleakley_74, Fury_74
- Track 40 : HomeFry_70
- Track 41 : CoffeeBean_64, Maselop_64, Apiary_64, Braxoaddie_64, Polyuyuki_64
- Track 42 : Gagjeri_63
- Track 43 : MacGully_73
- Track 44 : Troll4_59, Thoth_59, BigMama_57, Penelope2018_59, Helpful_62, Prager_59, SuperheroCarly_60, Visconti_60, Adjutor_58, PBI1_56, PLOT_59, Delton_60, WaldoWhy_61, Giuseppe_60, Gumball_59, Butterscotch_58, Mopey_60, SirHarley_61, KandZ_58, Chill_61, Nova_58
- Track 45 : Erk16_58
- Track 46 : Phalaborwa_62
- Track 47 : Hawkeye_66
- Track 48 : BiteSize_56, Terapin_57, Beyoncage_56, Sienna_56, Djokovic_56, Madi_56
- Track 49 : Suzy_56
- Track 50 : LilyPad_58
- Track 51 : LittleFella_63
- Track 52 : GretelLyn_67, Yikes_69, Sadboi_68, Zany_65
- Track 53 : Charminar_66, RazorC_67, Genamy16_70, Alyssamiracle_70, Stormer_67, Astralis_67, NovaSharks_69, Jamemuya19_66, Riduram_66, Avian_65, Rumi_68
- Track 54 : Gibbin_69, Patos_71, Ranch_67, NorManre_71, Lambo_65, ParvusTarda_66, Lila22_68
- Track 55 : Mima20_67, DoobyDoo_66, Pywacket_64, LavAbarElk_67, Alephilan_68
- Track 56 : BirthdayBoy_69, Fulcrum_67, Rukungu_69, GOATification_67, OtterstedtS21_67
- Track 57 : Apeppi_62, LuckyLeo_64
- Track 58 : Erutan_67
- Track 59 : Wojtek_63
- Track 60 : Jalebi_66, MoiGyank_70, Sampudon_67
- Track 61 : Tillicus_62
- Track 62 : DaviePasture_67, Rota_64
- Track 63 : DumpTruck_66
- Track 64 : Xenia2_66
- Track 65 : Rasputia_136
- Track 66 : Hendrix_141
- Track 67 : Leaf_139, Dewdrop_139
- Track 68 : Oaker_72, Thumb_73, Phreeze_71
- Track 69 : Konstantine_76
- Track 70 : Megatron06_73
- Track 71 : Nish23_74, Cborch11_74
- Track 72 : Damien_72
- Track 73 : BobtimousPrime_75
- Track 74 : Predator_71
- Track 75 : Puissant_69
- Track 76 : Beckerton_71
- Track 77 : DrLupo_79
- Track 78 : Barnyard_75
- Track 79 : Nilo_72, Papyrus_70, Riparian_72, Rope_70, Yelo_69, Candle_68, Weiss13_70, MontyDev_72
- Track 80 : Zenon_72, Send513_70
- Track 81 : Madruga_83, Demikore_86, Patience_85, Labelle_84, SuperSonics_88

- Track 82 : ChewyVIII_77

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

The start number called the most often in the published annotations is 33, it was called in 39 of the 166 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Alephlan_68, Alyssamiracle_70, Apeppi_62, Astralis_67, Avian_65, BirthdayBoy_69, Charminar_66, DaviePasture_67, DoobyDoo_66, DumpTruck_66, Erutan_67, Fulcrum_67, GOATification_67, Genamy16_70, Gibbin_69, GretellLyn_67, Jalebi_66, Jamemuya19_66, Lambo_65, LavAbarElk_67, Lila22_68, LuckyLeo_64, Mima20_67, MoiGyank_70, NorManre_71, NovaSharks_69, OtterstedtS21_67, ParvusTarda_66, Patos_71, Pywacket_64, Ranch_67, RazorC_67, Riduram_66, Rota_64, Rukungu_69, Rumi_68, Sadboi_68, Sampudon_67, Stormer_67, Tillicus_62, Wojtek_63, Xenia2_66, Yikes_69, Zany_65,

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

-

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

- Adjutor_58, Aikoy_76, Apiary_64, Arti_64, Barnyard_75, Beckerton_71, Beyoncage_56, BiPauneto_68, BigMama_57, BiteSize_56, BobtimousPrime_75, Bonum_69, Braxoaddie_64, Buggaboo_67, Butterscotch_58, Candle_68, Cborch11_74, ChewyVIII_77, Chill_61, CoffeeBean_64, Commandaria_66, Crosby_54, Cuke_77, Dalilpop_69, Damien_72, Delton_60, Demikore_86, Dewdrop_139, Djokovic_56, DrLupo_79, Emianna_65, Ennea_72, Erk16_58, Flapper_68, Float294_66, Fowlmouth_78, Foxboro_66, Fury_74, GRU1_54, GTE5_54, GTE8_54, Gagieri_63, Galactica_43, Giuseppe_60, GrootJr_67, Gumball_59, Hawkeye_66, Helpful_62, Hendrix_141, Hiyaa_45, HomeFry_70, HubbaBubba_60, IDyn_64, Indlulamithi_69, Intolerant_51, Jifall16_64, Kabluna_68, KandZ_58, Keanu_44, KidneyBean_65, Kokushibo_46, Konstantine_76, Kurt_65, Labelle_84, Leaf_139, Leopard_75, LilyPad_58, LittleFella_63, Lollipop1437_69, MacGully_73, Madi_56, Madruga_83, Marietta_66, Maselop_64, Megatron06_73, MerCougar_67, Microdon_52, MontyDev_72, Mopey_60, MrMiyagi_77, NadineRae_65, NatB6_65, Nilo_72, Nish23_74, NosilaM_67, Nova_58, NovumRegina_65, Oaker_72, Onyinye_76, Outis_66, PBI1_56, PLOT_59, Papyrus_70, Patience_85, Patio_67, Pemberton_68, Penelope2018_59, Phalaborwa_62, Phomeo_64, Phreeze_71, Pleakley_74, Polyuyuki_64, Prager_59, Predator_71, Puissant_69, Rasputia_136, RedRaider_72, Riparian_72, Rope_70, Scuba_75, Send513_70, Shynx_53, Sienna_56, SirHarley_61, Skysand_67, Spocter_44, StarStruck_66, Stuff_53, Sukkupi_66, SuperSonics_88, SuperSulley_67, SuperheroCarly_60, Suzy_56, Terapin_57, Thoth_59, Thumb_73, Tracker_65, Troll4_59, Turuncu_68, Visconti_60, WaldoWhy_61, Weiss13_70, Wheezy_65, WhoseManz_65, Yelo_69, Yndexa_66, Zenon_72,

Summary by start number:

Start 1:

- Found in 1 of 181 (0.6%) of genes in pham

- Manual Annotations of this start: 1 of 166
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Galactica_43 (BQ),

Start 3:

- Found in 5 of 181 (2.8%) of genes in pham
- Manual Annotations of this start: 5 of 166
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Crosby_54 (BH), Intolerant_51 (BH), Microdon_52 (BH), Shynx_53 (BH), Stuff_53 (BH),

Start 10:

- Found in 2 of 181 (1.1%) of genes in pham
- Manual Annotations of this start: 2 of 166
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Fowlmouth_78 (AC), MrMiyagi_77 (AC),

Start 18:

- Found in 15 of 181 (8.3%) of genes in pham
- Manual Annotations of this start: 12 of 166
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Dalilpop_69 (CR1), Ennea_72 (CR3), Flapper_68 (CR1), Float294_66 (CR3), Fury_74 (CR5), GRU1_54 (CR1), GTE5_54 (CR1), HomeFry_70 (CR5), Lollipop1437_69 (CR3), Patio_67 (CR3), Pleakley_74 (CR5), RedRaider_72 (CR3), Scuba_75 (CR5), Skysand_67 (CR3), Turuncu_68 (CR1),

Start 19:

- Found in 5 of 181 (2.8%) of genes in pham
- Manual Annotations of this start: 3 of 166
- Called 80.0% of time when present
- Phage (with cluster) where this start called: Hiyaa_45 (BQ), Keanu_44 (BQ), Kokushibo_46 (BQ), Spocter_44 (BQ),

Start 23:

- Found in 1 of 181 (0.6%) of genes in pham
- Manual Annotations of this start: 1 of 166
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Commandaria_66 (CR2),

Start 26:

- Found in 4 of 181 (2.2%) of genes in pham
- Manual Annotations of this start: 4 of 166
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Dewdrop_139 (GC), Hendrix_141 (GC), Leaf_139 (GC), Rasputia_136 (GC),

Start 27:

- Found in 2 of 181 (1.1%) of genes in pham
- Manual Annotations of this start: 2 of 166
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Cuke_77 (AC), Indlulamithi_69 (AC),

Start 28:

- Found in 10 of 181 (5.5%) of genes in pham
- Manual Annotations of this start: 10 of 166
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Candle_68 (R), MontyDev_72 (R), Nilo_72 (R), Papyrus_70 (R), Riparian_72 (R), Rope_70 (R), Send513_70 (R), Weiss13_70 (R), Yelo_69 (R), Zenon_72 (R),

Start 30:

- Found in 28 of 181 (15.5%) of genes in pham
- Manual Annotations of this start: 26 of 166
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Arti_64 (CR2), BiPauneto_68 (CR4), Bonum_69 (CR2), Buggaboo_67 (CR2), Emianna_65 (CR2), Foxboro_66 (CR2), GTE8_54 (CR2), GrootJr_67 (CR2), HubbaBubba_60 (CR4), IDyn_64 (CR4), Jifall16_64 (CR2), Kabluna_68 (CR2), KidneyBean_65 (CR2), Kurt_65 (CR2), Marietta_66 (CR4), MerCougar_67 (CR2), NadineRae_65 (CR4), NatB6_65 (CR2), NosilaM_67 (CR2), NovumRegina_65 (CR2), Pemberton_68 (CR4), Phomeo_64 (CR2), Sukkupi_66 (CR4), SuperSulley_67 (CR2), Tracker_65 (CR2), Wheezy_65 (CR2), WhoseManz_65 (CR4), Yndexa_66 (CR4),

Start 31:

- Found in 10 of 181 (5.5%) of genes in pham
- Manual Annotations of this start: 9 of 166
- Called 90.0% of time when present
- Phage (with cluster) where this start called: Beyoncage_56 (DG1), BiteSize_56 (DG1), Djokovic_56 (DG1), LilyPad_58 (DG1), LittleFella_63 (DG2), Madi_56 (DG1), Sienna_56 (DG1), Suzy_56 (DG1), Terapin_57 (DG1),

Start 32:

- Found in 3 of 181 (1.7%) of genes in pham
- Manual Annotations of this start: 2 of 166
- Called 66.7% of time when present
- Phage (with cluster) where this start called: Aikoy_76 (AE), Leopard_75 (AE),

Start 33:

- Found in 44 of 181 (24.3%) of genes in pham
- Manual Annotations of this start: 39 of 166
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Alephilan_68 (DV), Alyssamiracle_70 (DV), Apeppi_62 (DV), Astralis_67 (DV), Avian_65 (DV), BirthdayBoy_69 (DV), Charminar_66 (DV), DaviePasture_67 (DV), DoobyDoo_66 (DV), DumpTruck_66 (DV), Erutan_67 (DV), Fulcrum_67 (DV), GOATification_67 (DV), Genamy16_70 (DV), Gibbin_69 (DV), GretelLyn_67 (DV), Jalebi_66 (DV), Jamemuya19_66 (DV), Lambo_65 (DV), LavAbarElk_67 (DV), Lila22_68 (DV), LuckyLeo_64 (DV), Mima20_67 (DV), MoiGyank_70 (DV), NorManre_71 (DV), NovaSharks_69 (DV), OtterstedtS21_67 (DV), ParvusTarda_66 (DV), Patos_71 (DV), Pywacket_64 (DV), Ranch_67 (DV), RazorC_67 (DV), Riduram_66 (DV), Rota_64 (DV), Rukungu_69 (DV), Rumi_68 (DV), Sadboi_68 (DV), Sampudon_67 (DV), Stormer_67 (DV), Tillicus_62 (DV), Wojtek_63 (DV), Xenia2_66 (DV), Yikes_69 (DV), Zany_65 (DV),

Start 34:

- Found in 7 of 181 (3.9%) of genes in pham

- Manual Annotations of this start: 5 of 166
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Demikore_86 (U), Labelle_84 (U), Madrugua_83 (U), Outis_66 (CR2), Patience_85 (U), StarStruck_66 (CR2), SuperSonics_88 (U),

Start 36:

- Found in 7 of 181 (3.9%) of genes in pham
- Manual Annotations of this start: 7 of 166
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Apiary_64 (CR6), Braxoaddie_64 (CR6), CoffeeBean_64 (CR6), Gagieri_63 (CR6), MacGully_73 (CR7), Maselop_64 (CR6), Polyyuki_64 (CR6),

Start 37:

- Found in 12 of 181 (6.6%) of genes in pham
- Manual Annotations of this start: 11 of 166
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Beckerton_71 (H1), BobtimousPrime_75 (H1), Cborch11_74 (H1), Damien_72 (H1), Konstantine_76 (H1), Megatron06_73 (H1), Nish23_74 (H1), Oaker_72 (H1), Phreeze_71 (H1), Predator_71 (H1), Puissant_69 (H1), Thumb_73 (H1),

Start 41:

- Found in 29 of 181 (16.0%) of genes in pham
- Manual Annotations of this start: 24 of 166
- Called 86.2% of time when present
- Phage (with cluster) where this start called: Adjutor_58 (D1), Barnyard_75 (H2), BigMama_57 (D1), Butterscotch_58 (D1), Chill_61 (D1), Delton_60 (D1), DrLupo_79 (H2), Erk16_58 (D1), Giuseppe_60 (D1), Gumball_59 (D1), Helpful_62 (D1), KandZ_58 (D1), Mopey_60 (D1), Nova_58 (D1), PBI1_56 (D1), PLOT_59 (D1), Penelope2018_59 (D1), Phalaborwa_62 (D1), Prager_59 (D1), SirHarley_61 (D1), SuperheroCarly_60 (D1), Thoth_59 (D1), Troll4_59 (D1), Visconti_60 (D1), WaldoWhy_61 (D1),

Start 44:

- Found in 5 of 181 (2.8%) of genes in pham
- Manual Annotations of this start: 3 of 166
- Called 60.0% of time when present
- Phage (with cluster) where this start called: ChewyVIII_77 (singleton), Hawkeye_66 (D2), Onyinye_76 (AE),

Summary by clusters:

There are 22 clusters represented in this pham: singleton, BH, BQ, DV, AC, AE, DG2, R, GC, CR2, CR3, CR1, CR6, CR7, CR4, CR5, H2, H1, DG1, U, D2, D1,

Info for manual annotations of cluster AC:

- Start number 10 was manually annotated 2 times for cluster AC.
- Start number 27 was manually annotated 2 times for cluster AC.

Info for manual annotations of cluster AE:

- Start number 32 was manually annotated 2 times for cluster AE.

- Start number 44 was manually annotated 1 time for cluster AE.

Info for manual annotations of cluster BH:

- Start number 3 was manually annotated 5 times for cluster BH.

Info for manual annotations of cluster BQ:

- Start number 1 was manually annotated 1 time for cluster BQ.
- Start number 19 was manually annotated 3 times for cluster BQ.

Info for manual annotations of cluster CR1:

- Start number 18 was manually annotated 3 times for cluster CR1.

Info for manual annotations of cluster CR2:

- Start number 23 was manually annotated 1 time for cluster CR2.
- Start number 30 was manually annotated 18 times for cluster CR2.
- Start number 34 was manually annotated 2 times for cluster CR2.

Info for manual annotations of cluster CR3:

- Start number 18 was manually annotated 6 times for cluster CR3.

Info for manual annotations of cluster CR4:

- Start number 30 was manually annotated 8 times for cluster CR4.

Info for manual annotations of cluster CR5:

- Start number 18 was manually annotated 3 times for cluster CR5.

Info for manual annotations of cluster CR6:

- Start number 36 was manually annotated 6 times for cluster CR6.

Info for manual annotations of cluster CR7:

- Start number 36 was manually annotated 1 time for cluster CR7.

Info for manual annotations of cluster D1:

- Start number 41 was manually annotated 22 times for cluster D1.

Info for manual annotations of cluster D2:

- Start number 44 was manually annotated 1 time for cluster D2.

Info for manual annotations of cluster DG1:

- Start number 31 was manually annotated 8 times for cluster DG1.

Info for manual annotations of cluster DG2:

- Start number 31 was manually annotated 1 time for cluster DG2.

Info for manual annotations of cluster DV:

- Start number 33 was manually annotated 39 times for cluster DV.

Info for manual annotations of cluster GC:

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

Info for manual annotations of cluster H1:

- Start number 37 was manually annotated 11 times for cluster H1.

Info for manual annotations of cluster H2:

- Start number 41 was manually annotated 2 times for cluster H2.

Info for manual annotations of cluster R:

- Start number 28 was manually annotated 10 times for cluster R.

Info for manual annotations of cluster U:

- Start number 34 was manually annotated 3 times for cluster U.

Gene Information:

Gene: Adjutor_58 Start: 44429, Stop: 45289, Start Num: 41

Candidate Starts for Adjutor_58:

(12, 44357), (Start: 41 @44429 has 24 MA's), (49, 44474), (52, 44486), (53, 44504), (56, 44516), (59, 44540), (60, 44543), (95, 44696), (98, 44717), (101, 44726), (105, 44732), (122, 44822), (124, 44825), (126, 44834), (131, 44855), (156, 44966), (159, 44978), (163, 44996), (181, 45047), (184, 45056), (190, 45086), (191, 45089),

Gene: Aikoy_76 Start: 51990, Stop: 52910, Start Num: 32

Candidate Starts for Aikoy_76:

(Start: 32 @51990 has 2 MA's), (Start: 44 @52005 has 3 MA's), (53, 52077), (56, 52089), (59, 52113), (60, 52116), (67, 52146), (82, 52209), (96, 52266), (98, 52284), (101, 52293), (105, 52299), (113, 52329), (147, 52488), (149, 52497), (150, 52500), (159, 52545), (163, 52563), (181, 52611), (193, 52659), (199, 52698), (221, 52803),

Gene: Alephilan_68 Start: 45485, Stop: 46561, Start Num: 33

Candidate Starts for Alephilan_68:

(Start: 33 @45485 has 39 MA's), (63, 45617), (75, 45665), (95, 45746), (97, 45758), (98, 45767), (101, 45776), (130, 45899), (135, 45920), (143, 45947), (159, 46028), (163, 46046), (171, 46067), (188, 46145), (207, 46229), (230, 46394), (240, 46532),

Gene: Alyssamiracle_70 Start: 44487, Stop: 45557, Start Num: 33

Candidate Starts for Alyssamiracle_70:

(Start: 33 @44487 has 39 MA's), (57, 44583), (63, 44619), (75, 44667), (97, 44760), (98, 44769), (101, 44778), (130, 44901), (135, 44922), (143, 44949), (159, 45030), (163, 45048), (171, 45069), (188, 45147), (207, 45231), (240, 45528),

Gene: Apeppi_62 Start: 44646, Stop: 45731, Start Num: 33

Candidate Starts for Apeppi_62:

(Start: 33 @44646 has 39 MA's), (56, 44739), (63, 44778), (75, 44826), (98, 44928), (101, 44937), (130, 45060), (135, 45081), (139, 45096), (143, 45108), (159, 45189), (163, 45207), (171, 45228), (177, 45249), (188, 45306), (207, 45390), (239, 45690),

Gene: Apiary_64 Start: 48400, Stop: 47549, Start Num: 36

Candidate Starts for Apiary_64:

(Start: 36 @48400 has 7 MA's), (50, 48340), (74, 48220), (78, 48208), (98, 48106), (102, 48097), (108, 48079), (111, 48067), (122, 47995), (159, 47839), (163, 47821), (168, 47815), (198, 47692), (208, 47656), (214, 47635),

Gene: Arti_64 Start: 50810, Stop: 49992, Start Num: 30

Candidate Starts for Arti_64:

(17, 50837), (Start: 30 @50810 has 26 MA's), (50, 50738), (94, 50516), (125, 50375), (127, 50366), (140, 50315), (148, 50279), (159, 50225), (168, 50207), (174, 50192),

Gene: Astralis_67 Start: 44066, Stop: 45136, Start Num: 33

Candidate Starts for Astralis_67:

(Start: 33 @44066 has 39 MA's), (57, 44162), (63, 44198), (75, 44246), (97, 44339), (98, 44348), (101, 44357), (130, 44480), (135, 44501), (143, 44528), (159, 44609), (163, 44627), (171, 44648), (188, 44726), (207, 44810), (240, 45107),

Gene: Avian_65 Start: 44215, Stop: 45285, Start Num: 33

Candidate Starts for Avian_65:

(Start: 33 @44215 has 39 MA's), (57, 44311), (63, 44347), (75, 44395), (97, 44488), (98, 44497), (101, 44506), (130, 44629), (135, 44650), (143, 44677), (159, 44758), (163, 44776), (171, 44797), (188, 44875), (207, 44959), (240, 45256),

Gene: Barnyard_75 Start: 51526, Stop: 52548, Start Num: 41

Candidate Starts for Barnyard_75:

(Start: 41 @51526 has 24 MA's), (61, 51652), (62, 51658), (67, 51682), (81, 51742), (82, 51745), (91, 51790), (98, 51835), (101, 51844), (105, 51850), (109, 51868), (124, 51949), (129, 51970), (148, 52048), (154, 52093), (159, 52111), (163, 52129), (185, 52204), (200, 52273), (205, 52294), (225, 52387), (232, 52423),

Gene: Beckerton_71 Start: 53060, Stop: 54136, Start Num: 37

Candidate Starts for Beckerton_71:

(Start: 37 @53060 has 11 MA's), (42, 53066), (50, 53114), (60, 53177), (72, 53222), (82, 53270), (88, 53300), (98, 53357), (101, 53366), (105, 53372), (126, 53474), (134, 53507), (138, 53522), (147, 53561), (154, 53600), (159, 53618), (163, 53636), (164, 53639), (168, 53648), (185, 53714), (190, 53738), (229, 53927), (237, 54074), (238, 54077), (241, 54116), (243, 54125),

Gene: Beyoncage_56 Start: 41805, Stop: 42734, Start Num: 31

Candidate Starts for Beyoncage_56:

(Start: 31 @41805 has 9 MA's), (51, 41862), (56, 41895), (90, 42045), (92, 42054), (95, 42078), (98, 42099), (105, 42114), (108, 42126), (111, 42138), (118, 42177), (119, 42192), (128, 42225), (153, 42336), (154, 42342), (159, 42360), (166, 42384), (168, 42390), (178, 42420), (181, 42444), (201, 42537), (228, 42705),

Gene: BiPauneto_68 Start: 50402, Stop: 49605, Start Num: 30

Candidate Starts for BiPauneto_68:

(5, 50501), (17, 50429), (Start: 30 @50402 has 26 MA's), (50, 50327), (86, 50153), (117, 50021), (121, 49991), (125, 49982), (127, 49973), (133, 49946), (140, 49919), (150, 49874), (156, 49841), (159, 49829), (168, 49811), (191, 49730), (210, 49652),

Gene: BigMama_57 Start: 44505, Stop: 45365, Start Num: 41

Candidate Starts for BigMama_57:

(12, 44433), (Start: 41 @44505 has 24 MA's), (49, 44550), (52, 44562), (53, 44580), (56, 44592), (59, 44616), (60, 44619), (95, 44772), (98, 44793), (101, 44802), (105, 44808), (122, 44898), (124, 44901), (126, 44910), (131, 44931), (156, 45042), (159, 45054), (163, 45072), (181, 45123), (184, 45132), (190, 45162), (191, 45165),

Gene: BirthdayBoy_69 Start: 45791, Stop: 46882, Start Num: 33

Candidate Starts for BirthdayBoy_69:

(Start: 33 @45791 has 39 MA's), (63, 45923), (75, 45971), (95, 46052), (97, 46064), (98, 46073), (101, 46082), (130, 46205), (135, 46226), (143, 46253), (159, 46334), (163, 46352), (171, 46373), (188,

46451), (207, 46535), (230, 46700), (231, 46709), (240, 46853),

Gene: BiteSize_56 Start: 41891, Stop: 42820, Start Num: 31

Candidate Starts for BiteSize_56:

(Start: 31 @41891 has 9 MA's), (51, 41948), (56, 41981), (90, 42131), (92, 42140), (95, 42164), (98, 42185), (105, 42200), (108, 42212), (111, 42224), (118, 42263), (119, 42278), (128, 42311), (153, 42422), (154, 42428), (159, 42446), (166, 42470), (168, 42476), (178, 42506), (181, 42530), (201, 42623), (228, 42791),

Gene: BobtimousPrime_75 Start: 53362, Stop: 54438, Start Num: 37

Candidate Starts for BobtimousPrime_75:

(Start: 37 @53362 has 11 MA's), (42, 53368), (50, 53416), (72, 53524), (82, 53572), (88, 53602), (98, 53659), (101, 53668), (105, 53674), (126, 53776), (134, 53809), (138, 53824), (147, 53863), (154, 53902), (159, 53920), (163, 53938), (164, 53941), (168, 53950), (185, 54016), (190, 54040), (237, 54376), (238, 54379), (241, 54418), (243, 54427),

Gene: Bonum_69 Start: 51702, Stop: 50839, Start Num: 30

Candidate Starts for Bonum_69:

(7, 51780), (Start: 30 @51702 has 26 MA's), (64, 51540), (94, 51414), (125, 51273), (133, 51240), (140, 51213), (153, 51147), (159, 51123), (168, 51105), (185, 51051), (193, 51021), (201, 50976),

Gene: Braxoaddie_64 Start: 48389, Stop: 47538, Start Num: 36

Candidate Starts for Braxoaddie_64:

(Start: 36 @48389 has 7 MA's), (50, 48329), (74, 48209), (78, 48197), (98, 48095), (102, 48086), (108, 48068), (111, 48056), (122, 47984), (159, 47828), (163, 47810), (168, 47804), (198, 47681), (208, 47645), (214, 47624),

Gene: Buggaboo_67 Start: 52253, Stop: 51390, Start Num: 30

Candidate Starts for Buggaboo_67:

(7, 52331), (Start: 30 @52253 has 26 MA's), (64, 52091), (94, 51965), (125, 51824), (133, 51791), (140, 51764), (142, 51758), (153, 51698), (159, 51674), (168, 51656), (185, 51602), (193, 51572), (201, 51527),

Gene: Butterscotch_58 Start: 44489, Stop: 45349, Start Num: 41

Candidate Starts for Butterscotch_58:

(12, 44417), (Start: 41 @44489 has 24 MA's), (49, 44534), (52, 44546), (53, 44564), (56, 44576), (59, 44600), (60, 44603), (95, 44756), (98, 44777), (101, 44786), (105, 44792), (122, 44882), (124, 44885), (126, 44894), (131, 44915), (156, 45026), (159, 45038), (163, 45056), (181, 45107), (184, 45116), (190, 45146), (191, 45149),

Gene: Candle_68 Start: 52987, Stop: 53817, Start Num: 28

Candidate Starts for Candle_68:

(Start: 28 @52987 has 10 MA's), (48, 53032), (51, 53062), (56, 53095), (59, 53119), (72, 53167), (76, 53188), (95, 53281), (104, 53311), (106, 53314), (110, 53326), (129, 53410), (136, 53440), (154, 53524), (156, 53530), (159, 53542), (163, 53560), (169, 53587), (170, 53590), (191, 53686), (195, 53707), (201, 53734),

Gene: Cborch11_74 Start: 52603, Stop: 53682, Start Num: 37

Candidate Starts for Cborch11_74:

(6, 52492), (Start: 37 @52603 has 11 MA's), (42, 52609), (46, 52621), (50, 52657), (72, 52765), (82, 52813), (86, 52834), (87, 52840), (98, 52900), (101, 52909), (105, 52915), (126, 53017), (134, 53050), (138, 53065), (147, 53104), (154, 53143), (159, 53161), (163, 53179), (164, 53182), (168, 53191), (185, 53257), (190, 53281), (229, 53473), (237, 53620), (238, 53623), (241, 53662), (243, 53671),

Gene: Charminar_66 Start: 43825, Stop: 44895, Start Num: 33

Candidate Starts for Charminar_66:

(Start: 33 @43825 has 39 MA's), (57, 43921), (63, 43957), (75, 44005), (97, 44098), (98, 44107), (101, 44116), (130, 44239), (135, 44260), (143, 44287), (159, 44368), (163, 44386), (171, 44407), (188, 44485), (207, 44569), (240, 44866),

Gene: ChewyVIII_77 Start: 56830, Stop: 56066, Start Num: 44

Candidate Starts for ChewyVIII_77:

(Start: 44 @56830 has 3 MA's), (45, 56821), (50, 56782), (60, 56716), (105, 56524), (141, 56359), (145, 56335), (155, 56287), (162, 56260), (168, 56245),

Gene: Chill_61 Start: 44552, Stop: 45412, Start Num: 41

Candidate Starts for Chill_61:

(12, 44480), (Start: 41 @44552 has 24 MA's), (49, 44597), (52, 44609), (53, 44627), (56, 44639), (59, 44663), (60, 44666), (95, 44819), (98, 44840), (101, 44849), (105, 44855), (122, 44945), (124, 44948), (126, 44957), (131, 44978), (156, 45089), (159, 45101), (163, 45119), (181, 45170), (184, 45179), (190, 45209), (191, 45212),

Gene: CoffeeBean_64 Start: 48347, Stop: 47496, Start Num: 36

Candidate Starts for CoffeeBean_64:

(Start: 36 @48347 has 7 MA's), (50, 48287), (74, 48167), (78, 48155), (98, 48053), (102, 48044), (108, 48026), (111, 48014), (122, 47942), (159, 47786), (163, 47768), (168, 47762), (198, 47639), (208, 47603), (214, 47582),

Gene: Commandaria_66 Start: 52055, Stop: 51243, Start Num: 23

Candidate Starts for Commandaria_66:

(Start: 23 @52055 has 1 MA's), (50, 51968), (59, 51908), (72, 51851), (73, 51842), (125, 51608), (127, 51599), (133, 51575), (135, 51566), (140, 51548), (159, 51458), (168, 51440), (173, 51425), (174, 51419), (182, 51395),

Gene: Crosby_54 Start: 37524, Stop: 38537, Start Num: 3

Candidate Starts for Crosby_54:

(Start: 3 @37524 has 5 MA's), (13, 37605), (16, 37623), (50, 37725), (54, 37752), (55, 37758), (77, 37857), (96, 37941), (99, 37962), (109, 37995), (120, 38061), (127, 38085), (132, 38109), (154, 38217), (160, 38241), (163, 38253), (171, 38259), (180, 38292), (192, 38349), (206, 38415), (213, 38439), (216, 38457),

Gene: Cuke_77 Start: 46278, Stop: 47102, Start Num: 27

Candidate Starts for Cuke_77:

(Start: 27 @46278 has 2 MA's), (Start: 31 @46290 has 9 MA's), (39, 46302), (43, 46305), (56, 46389), (59, 46413), (69, 46458), (70, 46461), (88, 46539), (96, 46578), (105, 46611), (110, 46632), (111, 46635), (122, 46701), (125, 46707), (134, 46746), (138, 46761), (157, 46848), (159, 46857), (163, 46875), (176, 46914), (183, 46941), (189, 46971), (191, 46980), (196, 47004), (209, 47055),

Gene: Dalilpop_69 Start: 52942, Stop: 52163, Start Num: 18

Candidate Starts for Dalilpop_69:

(Start: 18 @52942 has 12 MA's), (50, 52855), (121, 52516), (125, 52507), (131, 52480), (133, 52474), (140, 52447), (148, 52417), (159, 52363), (160, 52357), (168, 52345), (184, 52303), (193, 52267),

Gene: Damien_72 Start: 52565, Stop: 53644, Start Num: 37

Candidate Starts for Damien_72:

(Start: 37 @52565 has 11 MA's), (42, 52571), (46, 52583), (50, 52619), (72, 52727), (82, 52775), (86, 52796), (87, 52802), (98, 52862), (101, 52871), (105, 52877), (126, 52979), (134, 53012), (138, 53027), (147, 53066), (154, 53105), (159, 53123), (163, 53141), (164, 53144), (168, 53153), (185, 53219), (190, 53243), (229, 53435), (237, 53582), (238, 53585), (241, 53624), (243, 53633),

Gene: DaviePasture_67 Start: 45399, Stop: 46469, Start Num: 33

Candidate Starts for DaviePasture_67:

(Start: 33 @45399 has 39 MA's), (63, 45531), (75, 45579), (97, 45672), (98, 45681), (101, 45690), (130, 45813), (135, 45834), (143, 45861), (159, 45942), (163, 45960), (171, 45981), (188, 46059), (207, 46143), (220, 46221), (230, 46308), (240, 46440),

Gene: Delton_60 Start: 44887, Stop: 45747, Start Num: 41

Candidate Starts for Delton_60:

(12, 44815), (Start: 41 @44887 has 24 MA's), (49, 44932), (52, 44944), (53, 44962), (56, 44974), (59, 44998), (60, 45001), (95, 45154), (98, 45175), (101, 45184), (105, 45190), (122, 45280), (124, 45283), (126, 45292), (131, 45313), (156, 45424), (159, 45436), (163, 45454), (181, 45505), (184, 45514), (190, 45544), (191, 45547),

Gene: Demikore_86 Start: 54792, Stop: 55850, Start Num: 34

Candidate Starts for Demikore_86:

(Start: 34 @54792 has 5 MA's), (51, 54849), (52, 54852), (56, 54882), (67, 54939), (72, 54954), (98, 55083), (107, 55107), (117, 55161), (120, 55185), (153, 55329), (154, 55335), (156, 55341), (158, 55350), (159, 55353), (163, 55371), (173, 55398), (185, 55458), (195, 55506), (207, 55554), (212, 55572), (223, 55632), (225, 55653), (235, 55761), (236, 55776),

Gene: Dewdrop_139 Start: 83232, Stop: 84089, Start Num: 26

Candidate Starts for Dewdrop_139:

(8, 83175), (11, 83184), (Start: 26 @83232 has 4 MA's), (29, 83238), (47, 83283), (79, 83448), (80, 83451), (83, 83475), (85, 83484), (100, 83559), (103, 83565), (107, 83577), (112, 83598), (123, 83664), (137, 83721), (140, 83730), (141, 83733), (144, 83751), (148, 83766), (151, 83787), (152, 83796), (160, 83829), (175, 83868), (194, 83955),

Gene: Djokovic_56 Start: 41804, Stop: 42733, Start Num: 31

Candidate Starts for Djokovic_56:

(Start: 31 @41804 has 9 MA's), (51, 41861), (56, 41894), (90, 42044), (92, 42053), (95, 42077), (98, 42098), (105, 42113), (108, 42125), (111, 42137), (118, 42176), (119, 42191), (128, 42224), (153, 42335), (154, 42341), (159, 42359), (166, 42383), (168, 42389), (178, 42419), (181, 42443), (201, 42536), (228, 42704),

Gene: DoobyDoo_66 Start: 44375, Stop: 45445, Start Num: 33

Candidate Starts for DoobyDoo_66:

(Start: 33 @44375 has 39 MA's), (63, 44507), (75, 44555), (95, 44636), (97, 44648), (98, 44657), (101, 44666), (130, 44789), (135, 44810), (143, 44837), (159, 44918), (163, 44936), (171, 44957), (188, 45035), (207, 45119), (230, 45284), (240, 45416),

Gene: DrLupo_79 Start: 52740, Stop: 53756, Start Num: 41

Candidate Starts for DrLupo_79:

(Start: 41 @52740 has 24 MA's), (61, 52866), (62, 52872), (67, 52896), (81, 52956), (82, 52959), (89, 52995), (91, 53004), (98, 53049), (101, 53058), (105, 53064), (109, 53082), (115, 53100), (124, 53163), (129, 53184), (148, 53262), (154, 53307), (159, 53325), (163, 53343), (165, 53349), (185, 53418), (205, 53508), (223, 53577), (242, 53739),

Gene: DumpTruck_66 Start: 44187, Stop: 45317, Start Num: 33

Candidate Starts for DumpTruck_66:

(Start: 33 @44187 has 39 MA's), (56, 44283), (63, 44322), (75, 44370), (95, 44451), (97, 44463), (98, 44472), (101, 44481), (135, 44625), (159, 44733), (163, 44751), (171, 44772), (178, 44796), (179, 44799), (188, 44850), (219, 44991), (233, 45147), (240, 45285),

Gene: Emianna_65 Start: 52042, Stop: 51221, Start Num: 30

Candidate Starts for Emianna_65:

(17, 52069), (Start: 30 @52042 has 26 MA's), (50, 51970), (94, 51748), (125, 51607), (127, 51598), (140, 51547), (148, 51511), (159, 51457), (168, 51439), (174, 51424), (202, 51301),

Gene: Ennea_72 Start: 53024, Stop: 52245, Start Num: 18

Candidate Starts for Ennea_72:

(Start: 18 @53024 has 12 MA's), (50, 52940), (125, 52592), (140, 52532), (148, 52496), (159, 52442), (168, 52424), (181, 52391), (184, 52382), (199, 52307), (202, 52295),

Gene: Erk16_58 Start: 44591, Stop: 45451, Start Num: 41

Candidate Starts for Erk16_58:

(Start: 41 @44591 has 24 MA's), (49, 44636), (52, 44648), (53, 44666), (56, 44678), (59, 44702), (60, 44705), (95, 44858), (98, 44879), (101, 44888), (105, 44894), (122, 44984), (124, 44987), (126, 44996), (131, 45017), (156, 45128), (159, 45140), (163, 45158), (181, 45209), (184, 45218), (190, 45248), (191, 45251),

Gene: Erutan_67 Start: 45017, Stop: 46087, Start Num: 33

Candidate Starts for Erutan_67:

(Start: 33 @45017 has 39 MA's), (63, 45149), (75, 45197), (97, 45290), (98, 45299), (101, 45308), (130, 45431), (135, 45452), (143, 45479), (159, 45560), (163, 45578), (171, 45599), (188, 45677), (207, 45761), (222, 45842), (240, 46058),

Gene: Flapper_68 Start: 52133, Stop: 51354, Start Num: 18

Candidate Starts for Flapper_68:

(Start: 18 @52133 has 12 MA's), (50, 52046), (60, 51983), (121, 51707), (125, 51698), (133, 51665), (140, 51638), (148, 51608), (159, 51554), (160, 51548), (168, 51536), (171, 51530), (184, 51494), (193, 51458),

Gene: Float294_66 Start: 52739, Stop: 51960, Start Num: 18

Candidate Starts for Float294_66:

(Start: 18 @52739 has 12 MA's), (50, 52655), (62, 52580), (125, 52307), (140, 52247), (148, 52211), (159, 52157), (168, 52139), (181, 52106), (184, 52097), (199, 52022), (202, 52010),

Gene: Fowlmouth_78 Start: 48807, Stop: 49670, Start Num: 10

Candidate Starts for Fowlmouth_78:

(Start: 10 @48807 has 2 MA's), (60, 48993), (69, 49035), (70, 49038), (88, 49116), (93, 49146), (105, 49188), (108, 49200), (111, 49212), (121, 49275), (125, 49284), (134, 49323), (157, 49425), (159, 49434), (176, 49491), (189, 49548), (191, 49557), (196, 49581), (209, 49632),

Gene: Foxboro_66 Start: 52567, Stop: 51746, Start Num: 30

Candidate Starts for Foxboro_66:

(17, 52594), (Start: 30 @52567 has 26 MA's), (50, 52495), (94, 52273), (125, 52132), (127, 52123), (140, 52072), (148, 52036), (159, 51982), (168, 51964), (174, 51949),

Gene: Fulcrum_67 Start: 45099, Stop: 46190, Start Num: 33

Candidate Starts for Fulcrum_67:

(Start: 33 @45099 has 39 MA's), (63, 45231), (75, 45279), (95, 45360), (97, 45372), (98, 45381), (101, 45390), (130, 45513), (135, 45534), (143, 45561), (159, 45642), (163, 45660), (171, 45681), (188, 45759), (207, 45843), (230, 46008), (231, 46017), (240, 46161),

Gene: Fury_74 Start: 51253, Stop: 50462, Start Num: 18

Candidate Starts for Fury_74:

(Start: 18 @51253 has 12 MA's), (50, 51157), (98, 50923), (125, 50812), (127, 50803), (131, 50785), (134, 50773), (140, 50752), (159, 50662), (168, 50644), (174, 50629), (191, 50569),

Gene: GOATification_67 Start: 45099, Stop: 46190, Start Num: 33

Candidate Starts for GOATification_67:

(Start: 33 @45099 has 39 MA's), (63, 45231), (75, 45279), (95, 45360), (97, 45372), (98, 45381), (101, 45390), (130, 45513), (135, 45534), (143, 45561), (159, 45642), (163, 45660), (171, 45681), (188, 45759), (207, 45843), (230, 46008), (231, 46017), (240, 46161),

Gene: GRU1_54 Start: 43981, Stop: 43202, Start Num: 18

Candidate Starts for GRU1_54:

(Start: 18 @43981 has 12 MA's), (50, 43894), (121, 43555), (125, 43546), (133, 43513), (140, 43486), (148, 43456), (159, 43402), (160, 43396), (168, 43384), (174, 43369), (184, 43342), (193, 43306),

Gene: GTE5_54 Start: 45013, Stop: 44234, Start Num: 18

Candidate Starts for GTE5_54:

(Start: 18 @45013 has 12 MA's), (50, 44926), (121, 44587), (125, 44578), (133, 44545), (140, 44518), (148, 44488), (159, 44434), (160, 44428), (168, 44416), (184, 44374), (193, 44338),

Gene: GTE8_54 Start: 45279, Stop: 44458, Start Num: 30

Candidate Starts for GTE8_54:

(17, 45306), (Start: 30 @45279 has 26 MA's), (50, 45207), (94, 44985), (125, 44844), (127, 44835), (140, 44784), (148, 44748), (159, 44694), (168, 44676), (174, 44661), (204, 44535),

Gene: Gagieri_63 Start: 48427, Stop: 47585, Start Num: 36

Candidate Starts for Gagieri_63:

(20, 48457), (22, 48454), (Start: 36 @48427 has 7 MA's), (50, 48367), (74, 48247), (75, 48244), (94, 48157), (98, 48133), (102, 48124), (108, 48106), (114, 48082), (122, 48022), (127, 48007), (150, 47911), (159, 47866), (163, 47848), (172, 47833), (198, 47719), (208, 47683), (214, 47662),

Gene: Galactica_43 Start: 30869, Stop: 31960, Start Num: 1

Candidate Starts for Galactica_43:

(Start: 1 @30869 has 1 MA's), (12, 30983), (14, 30989), (Start: 19 @31013 has 3 MA's), (24, 31022), (50, 31109), (58, 31172), (94, 31355), (97, 31370), (116, 31454), (127, 31505), (129, 31514), (146, 31589), (151, 31616), (161, 31661), (171, 31676), (172, 31679), (226, 31949),

Gene: Genamy16_70 Start: 44473, Stop: 45543, Start Num: 33

Candidate Starts for Genamy16_70:

(Start: 33 @44473 has 39 MA's), (57, 44569), (63, 44605), (75, 44653), (97, 44746), (98, 44755), (101, 44764), (130, 44887), (135, 44908), (143, 44935), (159, 45016), (163, 45034), (171, 45055), (188, 45133), (207, 45217), (240, 45514),

Gene: Gibbin_69 Start: 45904, Stop: 46995, Start Num: 33

Candidate Starts for Gibbin_69:

(Start: 33 @45904 has 39 MA's), (63, 46036), (75, 46084), (97, 46177), (98, 46186), (101, 46195), (130, 46318), (135, 46339), (143, 46366), (159, 46447), (163, 46465), (171, 46486), (188, 46564), (207, 46648), (230, 46813), (231, 46822), (240, 46966),

Gene: Giuseppe_60 Start: 44457, Stop: 45317, Start Num: 41

Candidate Starts for Giuseppe_60:

(12, 44385), (Start: 41 @44457 has 24 MA's), (49, 44502), (52, 44514), (53, 44532), (56, 44544), (59, 44568), (60, 44571), (95, 44724), (98, 44745), (101, 44754), (105, 44760), (122, 44850), (124, 44853), (126, 44862), (131, 44883), (156, 44994), (159, 45006), (163, 45024), (181, 45075), (184, 45084), (190, 45114), (191, 45117),

Gene: Gretellyn_67 Start: 45889, Stop: 46959, Start Num: 33

Candidate Starts for Gretellyn_67:

(Start: 33 @45889 has 39 MA's), (63, 46021), (75, 46069), (97, 46162), (98, 46171), (101, 46180), (130, 46303), (135, 46324), (143, 46351), (159, 46432), (163, 46450), (171, 46471), (188, 46549), (207, 46633), (230, 46798), (240, 46930),

Gene: GrootJr_67 Start: 51436, Stop: 50615, Start Num: 30

Candidate Starts for GrootJr_67:

(17, 51463), (Start: 30 @51436 has 26 MA's), (50, 51364), (94, 51142), (125, 51001), (127, 50992), (140, 50941), (148, 50905), (159, 50851), (168, 50833), (174, 50818), (202, 50695),

Gene: Gumball_59 Start: 44949, Stop: 45809, Start Num: 41

Candidate Starts for Gumball_59:

(12, 44877), (Start: 41 @44949 has 24 MA's), (49, 44994), (52, 45006), (53, 45024), (56, 45036), (59, 45060), (60, 45063), (95, 45216), (98, 45237), (101, 45246), (105, 45252), (122, 45342), (124, 45345), (126, 45354), (131, 45375), (156, 45486), (159, 45498), (163, 45516), (181, 45567), (184, 45576), (190, 45606), (191, 45609),

Gene: Hawkeye_66 Start: 44818, Stop: 45684, Start Num: 44

Candidate Starts for Hawkeye_66:

(21, 44773), (38, 44806), (Start: 41 @44815 has 24 MA's), (Start: 44 @44818 has 3 MA's), (60, 44929), (66, 44962), (95, 45082), (97, 45094), (98, 45103), (101, 45112), (105, 45118), (122, 45208), (124, 45211), (126, 45220), (138, 45268), (159, 45364), (163, 45382), (181, 45436), (184, 45445), (211, 45556),

Gene: Helpful_62 Start: 44818, Stop: 45678, Start Num: 41

Candidate Starts for Helpful_62:

(12, 44746), (Start: 41 @44818 has 24 MA's), (49, 44863), (52, 44875), (53, 44893), (56, 44905), (59, 44929), (60, 44932), (95, 45085), (98, 45106), (101, 45115), (105, 45121), (122, 45211), (124, 45214), (126, 45223), (131, 45244), (156, 45355), (159, 45367), (163, 45385), (181, 45436), (184, 45445), (190, 45475), (191, 45478),

Gene: Hendrix_141 Start: 87196, Stop: 88029, Start Num: 26

Candidate Starts for Hendrix_141:

(8, 87139), (11, 87148), (Start: 26 @87196 has 4 MA's), (29, 87202), (47, 87247), (68, 87370), (80, 87415), (83, 87439), (85, 87448), (94, 87490), (100, 87523), (103, 87529), (107, 87541), (112, 87562), (123, 87628), (137, 87685), (141, 87697), (144, 87715), (148, 87730), (151, 87751), (152, 87760), (160, 87793), (175, 87832), (194, 87919),

Gene: Hiyaa_45 Start: 32492, Stop: 33436, Start Num: 19

Candidate Starts for Hiyaa_45:

(12, 32462), (Start: 19 @32492 has 3 MA's), (24, 32501), (Start: 41 @32537 has 24 MA's), (50, 32588), (58, 32648), (65, 32693), (95, 32834), (97, 32846), (116, 32930), (117, 32933), (127, 32981), (129, 32990), (151, 33092), (161, 33137), (171, 33152), (172, 33155), (188, 33221), (206, 33302), (224, 33395),

Gene: HomeFry_70 Start: 49956, Stop: 49168, Start Num: 18

Candidate Starts for HomeFry_70:

(Start: 18 @49956 has 12 MA's), (25, 49944), (50, 49860), (81, 49713), (98, 49626), (121, 49524), (133, 49482), (134, 49476), (140, 49455), (159, 49365), (168, 49347), (174, 49332), (191, 49272),

Gene: HubbaBubba_60 Start: 46888, Stop: 46091, Start Num: 30

Candidate Starts for HubbaBubba_60:

(Start: 30 @46888 has 26 MA's), (50, 46813), (117, 46507), (121, 46477), (125, 46468), (127, 46459), (140, 46405), (150, 46360), (153, 46339), (156, 46327), (159, 46315), (168, 46297), (191, 46216), (210, 46138),

Gene: IDyn_64 Start: 48323, Stop: 47526, Start Num: 30

Candidate Starts for IDyn_64:

(17, 48350), (Start: 30 @48323 has 26 MA's), (50, 48248), (86, 48074), (117, 47942), (121, 47912), (125, 47903), (127, 47894), (140, 47840), (150, 47795), (153, 47774), (156, 47762), (159, 47750), (168, 47732), (191, 47651), (210, 47573),

Gene: Indlulamithi_69 Start: 49597, Stop: 50433, Start Num: 27

Candidate Starts for Indlulamithi_69:

(Start: 27 @49597 has 2 MA's), (43, 49612), (96, 49894), (105, 49930), (108, 49942), (110, 49951), (111, 49954), (124, 50023), (125, 50026), (133, 50059), (134, 50065), (140, 50086), (141, 50089), (153, 50152), (158, 50173), (159, 50176), (163, 50194), (167, 50212), (187, 50281), (191, 50302), (197, 50329), (209, 50377), (215, 50398),

Gene: Intolerant_51 Start: 37465, Stop: 38478, Start Num: 3

Candidate Starts for Intolerant_51:

(Start: 3 @37465 has 5 MA's), (4, 37489), (14, 37549), (16, 37564), (50, 37666), (54, 37693), (55, 37699), (77, 37798), (96, 37882), (99, 37903), (109, 37936), (120, 38002), (127, 38026), (132, 38050), (154, 38158), (160, 38182), (163, 38194), (171, 38200), (192, 38290), (206, 38356), (213, 38380), (216, 38398),

Gene: Jalebi_66 Start: 46242, Stop: 47312, Start Num: 33

Candidate Starts for Jalebi_66:

(Start: 33 @46242 has 39 MA's), (63, 46374), (75, 46422), (95, 46503), (97, 46515), (98, 46524), (101, 46533), (130, 46656), (135, 46677), (143, 46704), (159, 46785), (163, 46803), (171, 46824), (188, 46902), (207, 46986), (220, 47064), (230, 47151), (240, 47283),

Gene: Jamemuya19_66 Start: 44078, Stop: 45148, Start Num: 33

Candidate Starts for Jamemuya19_66:

(Start: 33 @44078 has 39 MA's), (57, 44174), (63, 44210), (75, 44258), (97, 44351), (98, 44360), (101, 44369), (130, 44492), (135, 44513), (143, 44540), (159, 44621), (163, 44639), (171, 44660), (188, 44738), (207, 44822), (240, 45119),

Gene: Jifall16_64 Start: 51698, Stop: 50877, Start Num: 30

Candidate Starts for Jifall16_64:

(Start: 30 @51698 has 26 MA's), (50, 51626), (94, 51404), (125, 51263), (127, 51254), (140, 51203), (148, 51167), (159, 51113), (168, 51095), (174, 51080), (202, 50957),

Gene: Kabluna_68 Start: 51031, Stop: 50168, Start Num: 30

Candidate Starts for Kabluna_68:

(7, 51109), (Start: 30 @51031 has 26 MA's), (64, 50869), (94, 50743), (125, 50602), (133, 50569), (140, 50542), (153, 50476), (159, 50452), (168, 50434), (185, 50380), (193, 50350), (201, 50305),

Gene: KandZ_58 Start: 44615, Stop: 45475, Start Num: 41

Candidate Starts for KandZ_58:

(12, 44543), (Start: 41 @44615 has 24 MA's), (49, 44660), (52, 44672), (53, 44690), (56, 44702), (59, 44726), (60, 44729), (95, 44882), (98, 44903), (101, 44912), (105, 44918), (122, 45008), (124, 45011), (126, 45020), (131, 45041), (156, 45152), (159, 45164), (163, 45182), (181, 45233), (184, 45242), (190, 45272), (191, 45275),

Gene: Keanu_44 Start: 32166, Stop: 33110, Start Num: 19

Candidate Starts for Keanu_44:

(15, 32145), (Start: 19 @32166 has 3 MA's), (50, 32262), (58, 32322), (97, 32520), (116, 32604), (117, 32607), (127, 32655), (129, 32664), (151, 32766), (161, 32811), (171, 32826), (172, 32829), (206, 32976), (224, 33069), (226, 33099),

Gene: KidneyBean_65 Start: 51822, Stop: 51001, Start Num: 30

Candidate Starts for KidneyBean_65:

(Start: 30 @51822 has 26 MA's), (50, 51750), (94, 51528), (125, 51387), (127, 51378), (140, 51327), (148, 51291), (159, 51237), (168, 51219), (174, 51204), (202, 51081),

Gene: Kokushibo_46 Start: 32549, Stop: 33493, Start Num: 19

Candidate Starts for Kokushibo_46:

(12, 32519), (Start: 19 @32549 has 3 MA's), (24, 32558), (Start: 41 @32594 has 24 MA's), (50, 32645), (58, 32705), (65, 32750), (95, 32891), (97, 32903), (116, 32987), (117, 32990), (127, 33038), (129, 33047), (151, 33149), (161, 33194), (171, 33209), (172, 33212), (188, 33278), (206, 33359), (224, 33452),

Gene: Konstantine_76 Start: 53396, Stop: 54475, Start Num: 37

Candidate Starts for Konstantine_76:

(Start: 37 @53396 has 11 MA's), (46, 53414), (50, 53450), (72, 53558), (82, 53606), (86, 53627), (87, 53633), (98, 53693), (101, 53702), (105, 53708), (126, 53810), (134, 53843), (138, 53858), (147, 53897), (154, 53936), (159, 53954), (163, 53972), (164, 53975), (168, 53984), (185, 54050), (190, 54074), (229, 54266), (237, 54413), (238, 54416), (241, 54455), (243, 54464),

Gene: Kurt_65 Start: 52057, Stop: 51236, Start Num: 30

Candidate Starts for Kurt_65:

(17, 52084), (Start: 30 @52057 has 26 MA's), (50, 51985), (94, 51763), (125, 51622), (127, 51613), (140, 51562), (148, 51526), (159, 51472), (168, 51454), (174, 51439), (202, 51316),

Gene: Labelle_84 Start: 54626, Stop: 55684, Start Num: 34

Candidate Starts for Labelle_84:

(Start: 34 @54626 has 5 MA's), (51, 54683), (52, 54686), (56, 54716), (67, 54773), (72, 54788), (98, 54917), (107, 54941), (117, 54995), (120, 55019), (153, 55163), (154, 55169), (156, 55175), (158, 55184), (159, 55187), (163, 55205), (173, 55232), (185, 55292), (195, 55340), (207, 55388), (212, 55406), (223, 55466), (225, 55487), (235, 55595), (236, 55610),

Gene: Lambo_65 Start: 44896, Stop: 45987, Start Num: 33

Candidate Starts for Lambo_65:

(Start: 33 @44896 has 39 MA's), (63, 45028), (75, 45076), (97, 45169), (98, 45178), (101, 45187), (130, 45310), (135, 45331), (143, 45358), (159, 45439), (163, 45457), (171, 45478), (188, 45556), (207, 45640), (230, 45805), (231, 45814), (240, 45958),

Gene: LavAbarElk_67 Start: 44636, Stop: 45706, Start Num: 33

Candidate Starts for LavAbarElk_67:

(Start: 33 @44636 has 39 MA's), (63, 44768), (75, 44816), (95, 44897), (97, 44909), (98, 44918), (101, 44927), (130, 45050), (135, 45071), (143, 45098), (159, 45179), (163, 45197), (171, 45218), (188, 45296), (207, 45380), (230, 45545), (240, 45677),

Gene: Leaf_139 Start: 83163, Stop: 84020, Start Num: 26

Candidate Starts for Leaf_139:

(8, 83106), (11, 83115), (Start: 26 @83163 has 4 MA's), (29, 83169), (47, 83214), (79, 83379), (80, 83382), (83, 83406), (85, 83415), (100, 83490), (103, 83496), (107, 83508), (112, 83529), (123, 83595), (137, 83652), (140, 83661), (141, 83664), (144, 83682), (148, 83697), (151, 83718), (152, 83727), (160, 83760), (175, 83799), (194, 83886),

Gene: Leopard_75 Start: 52296, Stop: 53216, Start Num: 32

Candidate Starts for Leopard_75:

(Start: 32 @52296 has 2 MA's), (Start: 44 @52311 has 3 MA's), (53, 52383), (56, 52395), (59, 52419), (60, 52422), (67, 52452), (82, 52515), (96, 52572), (98, 52590), (101, 52599), (105, 52605), (113, 52635), (147, 52794), (149, 52803), (150, 52806), (159, 52851), (163, 52869), (181, 52917), (193, 52965), (199, 53004), (221, 53109),

Gene: Lila22_68 Start: 45848, Stop: 46939, Start Num: 33

Candidate Starts for Lila22_68:

(Start: 33 @45848 has 39 MA's), (63, 45980), (75, 46028), (97, 46121), (98, 46130), (101, 46139), (130, 46262), (135, 46283), (143, 46310), (159, 46391), (163, 46409), (171, 46430), (188, 46508), (207, 46592), (230, 46757), (231, 46766), (240, 46910),

Gene: LilyPad_58 Start: 43001, Stop: 43912, Start Num: 31

Candidate Starts for LilyPad_58:

(Start: 31 @43001 has 9 MA's), (51, 43058), (52, 43061), (56, 43091), (90, 43241), (92, 43250), (98, 43295), (105, 43310), (108, 43322), (111, 43334), (118, 43373), (119, 43388), (125, 43406), (128, 43421), (153, 43532), (154, 43538), (159, 43556), (166, 43580), (168, 43586), (178, 43616), (196, 43709), (201, 43733), (228, 43883),

Gene: LittleFella_63 Start: 44521, Stop: 45468, Start Num: 31

Candidate Starts for LittleFella_63:

(Start: 31 @44521 has 9 MA's), (35, 44527), (59, 44644), (98, 44824), (105, 44839), (108, 44851), (139, 44992), (147, 45028), (159, 45085),

Gene: Lollipop1437_69 Start: 52704, Stop: 51925, Start Num: 18

Candidate Starts for Lollipop1437_69:

(Start: 18 @52704 has 12 MA's), (50, 52620), (125, 52272), (140, 52212), (148, 52176), (159, 52122), (168, 52104), (181, 52071), (184, 52062), (199, 51987), (202, 51975),

Gene: LuckyLeo_64 Start: 44646, Stop: 45731, Start Num: 33

Candidate Starts for LuckyLeo_64:

(Start: 33 @44646 has 39 MA's), (56, 44739), (63, 44778), (75, 44826), (98, 44928), (101, 44937), (130, 45060), (135, 45081), (139, 45096), (143, 45108), (159, 45189), (163, 45207), (171, 45228), (177, 45249), (188, 45306), (207, 45390), (239, 45690),

Gene: MacGully_73 Start: 51597, Stop: 50779, Start Num: 36

Candidate Starts for MacGully_73:

(2, 51750), (9, 51672), (Start: 36 @51597 has 7 MA's), (40, 51591), (50, 51537), (74, 51411), (98, 51294), (108, 51267), (111, 51255), (117, 51216), (122, 51183), (137, 51126), (168, 51003), (182, 50958), (217, 50805),

Gene: Madi_56 Start: 41882, Stop: 42811, Start Num: 31

Candidate Starts for Madi_56:

(Start: 31 @41882 has 9 MA's), (51, 41939), (56, 41972), (90, 42122), (92, 42131), (95, 42155), (98, 42176), (105, 42191), (108, 42203), (111, 42215), (118, 42254), (119, 42269), (128, 42302), (153, 42413), (154, 42419), (159, 42437), (166, 42461), (168, 42467), (178, 42497), (181, 42521), (201, 42614), (228, 42782),

Gene: Madruga_83 Start: 54580, Stop: 55638, Start Num: 34

Candidate Starts for Madruga_83:

(Start: 34 @54580 has 5 MA's), (51, 54637), (52, 54640), (56, 54670), (67, 54727), (72, 54742), (98, 54871), (107, 54895), (117, 54949), (120, 54973), (153, 55117), (154, 55123), (156, 55129), (158, 55138), (159, 55141), (163, 55159), (173, 55186), (185, 55246), (195, 55294), (207, 55342), (212, 55360), (223, 55420), (225, 55441), (235, 55549), (236, 55564),

Gene: Marietta_66 Start: 48435, Stop: 47638, Start Num: 30

Candidate Starts for Marietta_66:

(Start: 30 @48435 has 26 MA's), (50, 48360), (86, 48186), (117, 48054), (121, 48024), (125, 48015), (127, 48006), (133, 47979), (140, 47952), (150, 47907), (156, 47874), (159, 47862), (168, 47844), (191, 47763), (210, 47685),

Gene: Maselop_64 Start: 48423, Stop: 47572, Start Num: 36

Candidate Starts for Maselop_64:

(Start: 36 @48423 has 7 MA's), (50, 48363), (74, 48243), (78, 48231), (98, 48129), (102, 48120), (108, 48102), (111, 48090), (122, 48018), (159, 47862), (163, 47844), (168, 47838), (198, 47715), (208, 47679), (214, 47658),

Gene: Megatron06_73 Start: 53142, Stop: 54218, Start Num: 37

Candidate Starts for Megatron06_73:

(Start: 37 @53142 has 11 MA's), (42, 53148), (46, 53160), (50, 53196), (72, 53304), (82, 53352), (88, 53382), (98, 53439), (101, 53448), (105, 53454), (126, 53556), (134, 53589), (138, 53604), (147, 53643), (154, 53682), (159, 53700), (163, 53718), (164, 53721), (168, 53730), (185, 53796), (190, 53820), (229, 54009), (237, 54156), (238, 54159), (241, 54198), (243, 54207),

Gene: MerCougar_67 Start: 52388, Stop: 51525, Start Num: 30

Candidate Starts for MerCougar_67:

(Start: 30 @52388 has 26 MA's), (94, 52100), (108, 52049), (125, 51959), (135, 51917), (140, 51899), (148, 51863), (153, 51833), (159, 51809), (168, 51791),

Gene: Microdon_52 Start: 37262, Stop: 38275, Start Num: 3

Candidate Starts for Microdon_52:

(Start: 3 @37262 has 5 MA's), (13, 37343), (16, 37361), (50, 37463), (54, 37490), (77, 37595), (96, 37679), (99, 37700), (109, 37733), (120, 37799), (127, 37823), (132, 37847), (154, 37955), (160, 37979), (163, 37991), (171, 37997), (192, 38087), (197, 38114), (206, 38153), (213, 38177), (216, 38195),

Gene: Mima20_67 Start: 45405, Stop: 46475, Start Num: 33

Candidate Starts for Mima20_67:

(Start: 33 @45405 has 39 MA's), (63, 45537), (75, 45585), (95, 45666), (97, 45678), (98, 45687), (101, 45696), (130, 45819), (135, 45840), (143, 45867), (159, 45948), (163, 45966), (171, 45987), (188, 46065), (207, 46149), (230, 46314), (240, 46446),

Gene: MoiGyank_70 Start: 46170, Stop: 47240, Start Num: 33

Candidate Starts for MoiGyank_70:

(Start: 33 @46170 has 39 MA's), (63, 46302), (75, 46350), (95, 46431), (97, 46443), (98, 46452), (101, 46461), (130, 46584), (135, 46605), (143, 46632), (159, 46713), (163, 46731), (171, 46752), (188, 46830), (207, 46914), (220, 46992), (230, 47079), (240, 47211),

Gene: MontyDev_72 Start: 52628, Stop: 53458, Start Num: 28

Candidate Starts for MontyDev_72:

(Start: 28 @52628 has 10 MA's), (48, 52673), (51, 52703), (56, 52736), (59, 52760), (72, 52808), (76, 52829), (95, 52922), (104, 52952), (106, 52955), (110, 52967), (129, 53051), (136, 53081), (154, 53165), (156, 53171), (159, 53183), (163, 53201), (169, 53228), (170, 53231), (191, 53327), (195, 53348), (201, 53375),

Gene: Mopey_60 Start: 44493, Stop: 45353, Start Num: 41

Candidate Starts for Mopey_60:

(12, 44421), (Start: 41 @44493 has 24 MA's), (49, 44538), (52, 44550), (53, 44568), (56, 44580), (59, 44604), (60, 44607), (95, 44760), (98, 44781), (101, 44790), (105, 44796), (122, 44886), (124, 44889), (126, 44898), (131, 44919), (156, 45030), (159, 45042), (163, 45060), (181, 45111), (184, 45120), (190, 45150), (191, 45153),

Gene: MrMiyagi_77 Start: 49209, Stop: 50072, Start Num: 10

Candidate Starts for MrMiyagi_77:

(Start: 10 @49209 has 2 MA's), (60, 49395), (69, 49437), (70, 49440), (88, 49518), (93, 49548), (105, 49590), (111, 49614), (121, 49677), (125, 49686), (129, 49704), (134, 49725), (157, 49827), (159, 49836), (165, 49860), (176, 49893), (183, 49920), (189, 49950), (191, 49959), (196, 49983), (209, 50034),

Gene: NadineRae_65 Start: 48044, Stop: 47247, Start Num: 30

Candidate Starts for NadineRae_65:

(Start: 30 @48044 has 26 MA's), (50, 47969), (117, 47663), (121, 47633), (125, 47624), (127, 47615), (140, 47561), (150, 47516), (153, 47495), (156, 47483), (159, 47471), (168, 47453), (191, 47372), (210, 47294),

Gene: NatB6_65 Start: 51126, Stop: 50305, Start Num: 30

Candidate Starts for NatB6_65:

(17, 51153), (Start: 30 @51126 has 26 MA's), (50, 51054), (94, 50832), (125, 50691), (127, 50682), (140, 50631), (148, 50595), (159, 50541), (168, 50523), (174, 50508), (202, 50385),

Gene: Nilo_72 Start: 52985, Stop: 53815, Start Num: 28

Candidate Starts for Nilo_72:

(Start: 28 @52985 has 10 MA's), (48, 53030), (51, 53060), (56, 53093), (59, 53117), (72, 53165), (76, 53186), (95, 53279), (104, 53309), (106, 53312), (110, 53324), (129, 53408), (136, 53438), (154, 53522), (156, 53528), (159, 53540), (163, 53558), (169, 53585), (170, 53588), (191, 53684), (195, 53705), (201, 53732),

Gene: Nish23_74 Start: 52603, Stop: 53682, Start Num: 37

Candidate Starts for Nish23_74:

(6, 52492), (Start: 37 @52603 has 11 MA's), (42, 52609), (46, 52621), (50, 52657), (72, 52765), (82, 52813), (86, 52834), (87, 52840), (98, 52900), (101, 52909), (105, 52915), (126, 53017), (134, 53050), (138, 53065), (147, 53104), (154, 53143), (159, 53161), (163, 53179), (164, 53182), (168, 53191), (185, 53257), (190, 53281), (229, 53473), (237, 53620), (238, 53623), (241, 53662), (243, 53671),

Gene: NorManre_71 Start: 46296, Stop: 47387, Start Num: 33

Candidate Starts for NorManre_71:

(Start: 33 @46296 has 39 MA's), (63, 46428), (75, 46476), (97, 46569), (98, 46578), (101, 46587), (130, 46710), (135, 46731), (143, 46758), (159, 46839), (163, 46857), (171, 46878), (188, 46956), (207, 47040), (230, 47205), (231, 47214), (240, 47358),

Gene: NosilaM_67 Start: 51702, Stop: 50839, Start Num: 30

Candidate Starts for NosilaM_67:

(Start: 30 @51702 has 26 MA's), (64, 51540), (94, 51414), (125, 51273), (133, 51240), (140, 51213), (142, 51207), (153, 51147), (159, 51123), (168, 51105), (185, 51051), (193, 51021), (201, 50976),

Gene: Nova_58 Start: 44945, Stop: 45805, Start Num: 41

Candidate Starts for Nova_58:

(12, 44873), (Start: 41 @44945 has 24 MA's), (49, 44990), (52, 45002), (53, 45020), (56, 45032), (59, 45056), (60, 45059), (95, 45212), (98, 45233), (101, 45242), (105, 45248), (122, 45338), (124, 45341), (126, 45350), (131, 45371), (156, 45482), (159, 45494), (163, 45512), (181, 45563), (184, 45572), (190, 45602), (191, 45605),

Gene: NovaSharks_69 Start: 44064, Stop: 45134, Start Num: 33

Candidate Starts for NovaSharks_69:

(Start: 33 @44064 has 39 MA's), (57, 44160), (63, 44196), (75, 44244), (97, 44337), (98, 44346), (101, 44355), (130, 44478), (135, 44499), (143, 44526), (159, 44607), (163, 44625), (171, 44646), (188, 44724), (207, 44808), (240, 45105),

Gene: NovumRegina_65 Start: 51435, Stop: 50614, Start Num: 30

Candidate Starts for NovumRegina_65:

(17, 51462), (Start: 30 @51435 has 26 MA's), (50, 51363), (94, 51141), (125, 51000), (127, 50991), (140, 50940), (148, 50904), (159, 50850), (168, 50832), (174, 50817), (202, 50694),

Gene: Oaker_72 Start: 53171, Stop: 54247, Start Num: 37

Candidate Starts for Oaker_72:

(Start: 37 @53171 has 11 MA's), (42, 53177), (50, 53225), (72, 53333), (82, 53381), (88, 53411), (98, 53468), (101, 53477), (105, 53483), (126, 53585), (134, 53618), (138, 53633), (147, 53672), (154, 53711), (159, 53729), (163, 53747), (164, 53750), (168, 53759), (185, 53825), (190, 53849), (229, 54038), (237, 54185), (238, 54188), (241, 54227), (243, 54236),

Gene: Onyinye_76 Start: 52178, Stop: 53083, Start Num: 44

Candidate Starts for Onyinye_76:

(Start: 32 @52163 has 2 MA's), (Start: 44 @52178 has 3 MA's), (53, 52250), (56, 52262), (59, 52286), (60, 52289), (67, 52319), (82, 52382), (96, 52439), (98, 52457), (101, 52466), (105, 52472), (113, 52502), (147, 52661), (149, 52670), (150, 52673), (159, 52718), (163, 52736), (181, 52784), (193, 52832), (199, 52871), (221, 52976), (227, 53024),

Gene: OtterstedtS21_67 Start: 45230, Stop: 46321, Start Num: 33

Candidate Starts for OtterstedtS21_67:

(Start: 33 @45230 has 39 MA's), (63, 45362), (75, 45410), (95, 45491), (97, 45503), (98, 45512), (101, 45521), (130, 45644), (135, 45665), (143, 45692), (159, 45773), (163, 45791), (171, 45812), (188, 45890), (207, 45974), (230, 46139), (231, 46148), (240, 46292),

Gene: Outis_66 Start: 51894, Stop: 51040, Start Num: 34

Candidate Starts for Outis_66:

(Start: 34 @51894 has 5 MA's), (94, 51615), (108, 51564), (125, 51474), (135, 51432), (140, 51414), (148, 51378), (153, 51348), (159, 51324), (168, 51306),

Gene: PBI1_56 Start: 44420, Stop: 45280, Start Num: 41

Candidate Starts for PBI1_56:

(12, 44348), (Start: 41 @44420 has 24 MA's), (49, 44465), (52, 44477), (53, 44495), (56, 44507), (59, 44531), (60, 44534), (95, 44687), (98, 44708), (101, 44717), (105, 44723), (122, 44813), (124, 44816), (126, 44825), (131, 44846), (156, 44957), (159, 44969), (163, 44987), (181, 45038), (184, 45047), (190, 45077), (191, 45080),

Gene: PLOT_59 Start: 44472, Stop: 45332, Start Num: 41

Candidate Starts for PLOT_59:

(12, 44400), (Start: 41 @44472 has 24 MA's), (49, 44517), (52, 44529), (53, 44547), (56, 44559), (59, 44583), (60, 44586), (95, 44739), (98, 44760), (101, 44769), (105, 44775), (122, 44865), (124, 44868), (126, 44877), (131, 44898), (156, 45009), (159, 45021), (163, 45039), (181, 45090), (184, 45099), (190, 45129), (191, 45132),

Gene: Papyrus_70 Start: 52595, Stop: 53425, Start Num: 28

Candidate Starts for Papyrus_70:

(Start: 28 @52595 has 10 MA's), (48, 52640), (51, 52670), (56, 52703), (59, 52727), (72, 52775), (76, 52796), (95, 52889), (104, 52919), (106, 52922), (110, 52934), (129, 53018), (136, 53048), (154, 53132), (156, 53138), (159, 53150), (163, 53168), (169, 53195), (170, 53198), (191, 53294), (195, 53315), (201, 53342),

Gene: ParvusTarda_66 Start: 44602, Stop: 45693, Start Num: 33

Candidate Starts for ParvusTarda_66:

(Start: 33 @44602 has 39 MA's), (63, 44734), (75, 44782), (97, 44875), (98, 44884), (101, 44893), (130, 45016), (135, 45037), (143, 45064), (159, 45145), (163, 45163), (171, 45184), (188, 45262), (207, 45346), (230, 45511), (231, 45520), (240, 45664),

Gene: Patience_85 Start: 55493, Stop: 56551, Start Num: 34

Candidate Starts for Patience_85:

(Start: 34 @55493 has 5 MA's), (51, 55550), (52, 55553), (56, 55583), (67, 55640), (72, 55655), (98, 55784), (107, 55808), (117, 55862), (120, 55886), (153, 56030), (154, 56036), (156, 56042), (158, 56051), (159, 56054), (163, 56072), (173, 56099), (185, 56159), (195, 56207), (207, 56255), (212, 56273), (223, 56333), (225, 56354), (235, 56462), (236, 56477),

Gene: Patio_67 Start: 51761, Stop: 50982, Start Num: 18

Candidate Starts for Patio_67:

(Start: 18 @51761 has 12 MA's), (50, 51677), (125, 51329), (140, 51269), (148, 51233), (159, 51179), (168, 51161), (181, 51128), (184, 51119), (199, 51044), (202, 51032),

Gene: Patos_71 Start: 46295, Stop: 47386, Start Num: 33

Candidate Starts for Patos_71:

(Start: 33 @46295 has 39 MA's), (63, 46427), (75, 46475), (97, 46568), (98, 46577), (101, 46586), (130, 46709), (135, 46730), (143, 46757), (159, 46838), (163, 46856), (171, 46877), (188, 46955), (207, 47039), (230, 47204), (231, 47213), (240, 47357),

Gene: Pemberton_68 Start: 48797, Stop: 48000, Start Num: 30

Candidate Starts for Pemberton_68:

(5, 48896), (17, 48824), (Start: 30 @48797 has 26 MA's), (50, 48722), (86, 48548), (117, 48416), (121, 48386), (125, 48377), (127, 48368), (133, 48341), (140, 48314), (150, 48269), (156, 48236), (159, 48224), (168, 48206), (191, 48125), (210, 48047),

Gene: Penelope2018_59 Start: 44490, Stop: 45350, Start Num: 41

Candidate Starts for Penelope2018_59:

(12, 44418), (Start: 41 @44490 has 24 MA's), (49, 44535), (52, 44547), (53, 44565), (56, 44577), (59, 44601), (60, 44604), (95, 44757), (98, 44778), (101, 44787), (105, 44793), (122, 44883), (124, 44886), (126, 44895), (131, 44916), (156, 45027), (159, 45039), (163, 45057), (181, 45108), (184, 45117), (190, 45147), (191, 45150),

Gene: Phalaborwa_62 Start: 44931, Stop: 45791, Start Num: 41

Candidate Starts for Phalaborwa_62:

(12, 44859), (Start: 41 @44931 has 24 MA's), (52, 44988), (53, 45006), (56, 45018), (59, 45042), (60, 45045), (95, 45198), (98, 45219), (101, 45228), (105, 45234), (122, 45324), (124, 45327), (126, 45336), (131, 45357), (156, 45468), (159, 45480), (163, 45498), (181, 45549), (184, 45558), (191, 45591),

Gene: Phomeo_64 Start: 51694, Stop: 50873, Start Num: 30

Candidate Starts for Phomeo_64:

(Start: 30 @51694 has 26 MA's), (50, 51622), (94, 51400), (125, 51259), (127, 51250), (140, 51199), (148, 51163), (159, 51109), (168, 51091), (174, 51076), (202, 50953),

Gene: Phreeze_71 Start: 52138, Stop: 53217, Start Num: 37

Candidate Starts for Phreeze_71:

(Start: 37 @52138 has 11 MA's), (42, 52144), (50, 52192), (72, 52300), (82, 52348), (88, 52378), (98, 52435), (101, 52444), (105, 52450), (126, 52552), (134, 52585), (138, 52600), (147, 52639), (154, 52678), (159, 52696), (163, 52714), (164, 52717), (168, 52726), (185, 52792), (190, 52816), (229, 53008), (237, 53155), (238, 53158), (241, 53197), (243, 53206),

Gene: Pleakley_74 Start: 51254, Stop: 50463, Start Num: 18

Candidate Starts for Pleakley_74:

(Start: 18 @51254 has 12 MA's), (50, 51158), (98, 50924), (125, 50813), (127, 50804), (131, 50786), (134, 50774), (140, 50753), (159, 50663), (168, 50645), (174, 50630), (191, 50570),

Gene: Polyuki_64 Start: 48412, Stop: 47561, Start Num: 36

Candidate Starts for Polyuki_64:

(Start: 36 @48412 has 7 MA's), (50, 48352), (74, 48232), (78, 48220), (98, 48118), (102, 48109), (108, 48091), (111, 48079), (122, 48007), (159, 47851), (163, 47833), (168, 47827), (198, 47704), (208, 47668), (214, 47647),

Gene: Prager_59 Start: 44509, Stop: 45369, Start Num: 41

Candidate Starts for Prager_59:

(12, 44437), (Start: 41 @44509 has 24 MA's), (49, 44554), (52, 44566), (53, 44584), (56, 44596), (59, 44620), (60, 44623), (95, 44776), (98, 44797), (101, 44806), (105, 44812), (122, 44902), (124, 44905), (126, 44914), (131, 44935), (156, 45046), (159, 45058), (163, 45076), (181, 45127), (184, 45136), (190, 45166), (191, 45169),

Gene: Predator_71 Start: 51699, Stop: 52709, Start Num: 37

Candidate Starts for Predator_71:

(Start: 37 @51699 has 11 MA's), (42, 51705), (50, 51753), (52, 51759), (72, 51861), (82, 51909), (98, 51996), (101, 52005), (105, 52011), (110, 52032), (122, 52101), (126, 52113), (133, 52140), (134, 52146), (138, 52161), (147, 52200), (154, 52239), (159, 52257), (163, 52275), (164, 52278), (184, 52350), (185, 52362), (235, 52683),

Gene: Puissant_69 Start: 52254, Stop: 53387, Start Num: 37

Candidate Starts for Puissant_69:

(Start: 37 @52254 has 11 MA's), (42, 52260), (50, 52308), (72, 52416), (82, 52464), (88, 52494), (98, 52551), (101, 52560), (105, 52566), (126, 52668), (134, 52701), (138, 52716), (147, 52755), (154,

52794), (159, 52812), (163, 52830), (164, 52833), (168, 52842), (185, 52908), (190, 52932), (234, 53289), (241, 53367),

Gene: Pywacket_64 Start: 46014, Stop: 47084, Start Num: 33

Candidate Starts for Pywacket_64:

(Start: 33 @46014 has 39 MA's), (63, 46146), (75, 46194), (95, 46275), (97, 46287), (98, 46296), (101, 46305), (130, 46428), (135, 46449), (143, 46476), (159, 46557), (163, 46575), (171, 46596), (188, 46674), (207, 46758), (230, 46923), (240, 47055),

Gene: Ranch_67 Start: 44074, Stop: 45165, Start Num: 33

Candidate Starts for Ranch_67:

(Start: 33 @44074 has 39 MA's), (63, 44206), (75, 44254), (97, 44347), (98, 44356), (101, 44365), (130, 44488), (135, 44509), (143, 44536), (159, 44617), (163, 44635), (171, 44656), (188, 44734), (207, 44818), (230, 44983), (231, 44992), (240, 45136),

Gene: Rasputia_136 Start: 84636, Stop: 85487, Start Num: 26

Candidate Starts for Rasputia_136:

(Start: 26 @84636 has 4 MA's), (29, 84642), (39, 84663), (47, 84687), (60, 84780), (71, 84822), (83, 84879), (94, 84930), (100, 84963), (103, 84969), (112, 85002), (123, 85068), (137, 85125), (140, 85134), (141, 85137), (144, 85155), (151, 85191), (152, 85200), (160, 85233), (175, 85272), (186, 85317), (194, 85359), (203, 85392), (218, 85458),

Gene: RazorC_67 Start: 44218, Stop: 45288, Start Num: 33

Candidate Starts for RazorC_67:

(Start: 33 @44218 has 39 MA's), (57, 44314), (63, 44350), (75, 44398), (97, 44491), (98, 44500), (101, 44509), (130, 44632), (135, 44653), (143, 44680), (159, 44761), (163, 44779), (171, 44800), (188, 44878), (207, 44962), (240, 45259),

Gene: RedRaider_72 Start: 54080, Stop: 53301, Start Num: 18

Candidate Starts for RedRaider_72:

(Start: 18 @54080 has 12 MA's), (50, 53996), (84, 53831), (125, 53648), (140, 53588), (148, 53552), (159, 53498), (168, 53480), (181, 53447), (184, 53438), (199, 53363), (202, 53351),

Gene: Riduram_66 Start: 43793, Stop: 44863, Start Num: 33

Candidate Starts for Riduram_66:

(Start: 33 @43793 has 39 MA's), (57, 43889), (63, 43925), (75, 43973), (97, 44066), (98, 44075), (101, 44084), (130, 44207), (135, 44228), (143, 44255), (159, 44336), (163, 44354), (171, 44375), (188, 44453), (207, 44537), (240, 44834),

Gene: Riparian_72 Start: 52432, Stop: 53262, Start Num: 28

Candidate Starts for Riparian_72:

(Start: 28 @52432 has 10 MA's), (48, 52477), (51, 52507), (56, 52540), (59, 52564), (72, 52612), (76, 52633), (95, 52726), (104, 52756), (106, 52759), (110, 52771), (129, 52855), (136, 52885), (154, 52969), (156, 52975), (159, 52987), (163, 53005), (169, 53032), (170, 53035), (191, 53131), (195, 53152), (201, 53179),

Gene: Rope_70 Start: 52588, Stop: 53418, Start Num: 28

Candidate Starts for Rope_70:

(Start: 28 @52588 has 10 MA's), (48, 52633), (51, 52663), (56, 52696), (59, 52720), (72, 52768), (76, 52789), (95, 52882), (104, 52912), (106, 52915), (110, 52927), (129, 53011), (136, 53041), (154, 53125), (156, 53131), (159, 53143), (163, 53161), (169, 53188), (170, 53191), (191, 53287), (195, 53308), (201, 53335),

Gene: Rota_64 Start: 45088, Stop: 46158, Start Num: 33

Candidate Starts for Rota_64:

(Start: 33 @45088 has 39 MA's), (63, 45220), (75, 45268), (97, 45361), (98, 45370), (101, 45379), (130, 45502), (135, 45523), (143, 45550), (159, 45631), (163, 45649), (171, 45670), (188, 45748), (207, 45832), (220, 45910), (230, 45997), (240, 46129),

Gene: Rukungu_69 Start: 46093, Stop: 47184, Start Num: 33

Candidate Starts for Rukungu_69:

(Start: 33 @46093 has 39 MA's), (63, 46225), (75, 46273), (95, 46354), (97, 46366), (98, 46375), (101, 46384), (130, 46507), (135, 46528), (143, 46555), (159, 46636), (163, 46654), (171, 46675), (188, 46753), (207, 46837), (230, 47002), (231, 47011), (240, 47155),

Gene: Rumi_68 Start: 43761, Stop: 44831, Start Num: 33

Candidate Starts for Rumi_68:

(Start: 33 @43761 has 39 MA's), (57, 43857), (63, 43893), (75, 43941), (97, 44034), (98, 44043), (101, 44052), (130, 44175), (135, 44196), (143, 44223), (159, 44304), (163, 44322), (171, 44343), (188, 44421), (207, 44505), (240, 44802),

Gene: Sadboi_68 Start: 45890, Stop: 46960, Start Num: 33

Candidate Starts for Sadboi_68:

(Start: 33 @45890 has 39 MA's), (63, 46022), (75, 46070), (97, 46163), (98, 46172), (101, 46181), (130, 46304), (135, 46325), (143, 46352), (159, 46433), (163, 46451), (171, 46472), (188, 46550), (207, 46634), (230, 46799), (240, 46931),

Gene: Sampudon_67 Start: 46242, Stop: 47312, Start Num: 33

Candidate Starts for Sampudon_67:

(Start: 33 @46242 has 39 MA's), (63, 46374), (75, 46422), (95, 46503), (97, 46515), (98, 46524), (101, 46533), (130, 46656), (135, 46677), (143, 46704), (159, 46785), (163, 46803), (171, 46824), (188, 46902), (207, 46986), (220, 47064), (230, 47151), (240, 47283),

Gene: Scuba_75 Start: 51339, Stop: 50548, Start Num: 18

Candidate Starts for Scuba_75:

(Start: 18 @51339 has 12 MA's), (50, 51243), (98, 51009), (125, 50898), (127, 50889), (134, 50859), (140, 50838), (159, 50748), (168, 50730), (174, 50715), (191, 50655),

Gene: Send513_70 Start: 52966, Stop: 53796, Start Num: 28

Candidate Starts for Send513_70:

(Start: 28 @52966 has 10 MA's), (48, 53011), (51, 53041), (56, 53074), (59, 53098), (72, 53146), (76, 53167), (95, 53260), (104, 53290), (106, 53293), (129, 53389), (136, 53419), (154, 53503), (156, 53509), (159, 53521), (163, 53539), (169, 53566), (170, 53569), (191, 53665), (195, 53686), (201, 53713),

Gene: Shynx_53 Start: 37701, Stop: 38714, Start Num: 3

Candidate Starts for Shynx_53:

(Start: 3 @37701 has 5 MA's), (14, 37785), (16, 37800), (50, 37902), (54, 37929), (55, 37935), (77, 38034), (96, 38118), (99, 38139), (109, 38172), (120, 38238), (127, 38262), (132, 38286), (154, 38394), (160, 38418), (163, 38430), (171, 38436), (192, 38526), (206, 38592), (213, 38616), (216, 38634),

Gene: Sienna_56 Start: 41882, Stop: 42811, Start Num: 31

Candidate Starts for Sienna_56:

(Start: 31 @41882 has 9 MA's), (51, 41939), (56, 41972), (90, 42122), (92, 42131), (95, 42155), (98, 42176), (105, 42191), (108, 42203), (111, 42215), (118, 42254), (119, 42269), (128, 42302), (153,

42413), (154, 42419), (159, 42437), (166, 42461), (168, 42467), (178, 42497), (181, 42521), (201, 42614), (228, 42782),

Gene: SirHarley_61 Start: 44932, Stop: 45792, Start Num: 41

Candidate Starts for SirHarley_61:

(12, 44860), (Start: 41 @44932 has 24 MA's), (49, 44977), (52, 44989), (53, 45007), (56, 45019), (59, 45043), (60, 45046), (95, 45199), (98, 45220), (101, 45229), (105, 45235), (122, 45325), (124, 45328), (126, 45337), (131, 45358), (156, 45469), (159, 45481), (163, 45499), (181, 45550), (184, 45559), (190, 45589), (191, 45592),

Gene: Skysand_67 Start: 52239, Stop: 51460, Start Num: 18

Candidate Starts for Skysand_67:

(Start: 18 @52239 has 12 MA's), (50, 52155), (62, 52080), (125, 51807), (140, 51747), (148, 51711), (159, 51657), (168, 51639), (181, 51606), (184, 51597), (199, 51522), (202, 51510),

Gene: Spocter_44 Start: 32522, Stop: 33466, Start Num: 19

Candidate Starts for Spocter_44:

(12, 32492), (Start: 19 @32522 has 3 MA's), (24, 32531), (Start: 41 @32567 has 24 MA's), (50, 32618), (58, 32678), (65, 32723), (95, 32864), (97, 32876), (116, 32960), (117, 32963), (127, 33011), (129, 33020), (151, 33122), (161, 33167), (171, 33182), (172, 33185), (188, 33251), (206, 33332), (224, 33425),

Gene: StarStruck_66 Start: 51894, Stop: 51040, Start Num: 34

Candidate Starts for StarStruck_66:

(Start: 34 @51894 has 5 MA's), (94, 51615), (108, 51564), (125, 51474), (135, 51432), (140, 51414), (148, 51378), (153, 51348), (159, 51324), (168, 51306),

Gene: Stormer_67 Start: 43765, Stop: 44835, Start Num: 33

Candidate Starts for Stormer_67:

(Start: 33 @43765 has 39 MA's), (57, 43861), (63, 43897), (75, 43945), (97, 44038), (98, 44047), (101, 44056), (130, 44179), (135, 44200), (143, 44227), (159, 44308), (163, 44326), (171, 44347), (188, 44425), (207, 44509), (240, 44806),

Gene: Stuff_53 Start: 37765, Stop: 38778, Start Num: 3

Candidate Starts for Stuff_53:

(Start: 3 @37765 has 5 MA's), (14, 37849), (16, 37864), (50, 37966), (54, 37993), (55, 37999), (77, 38098), (96, 38182), (99, 38203), (109, 38236), (120, 38302), (127, 38326), (132, 38350), (154, 38458), (160, 38482), (163, 38494), (171, 38500), (192, 38590), (206, 38656), (213, 38680), (216, 38698),

Gene: Sukkupi_66 Start: 50275, Stop: 49478, Start Num: 30

Candidate Starts for Sukkupi_66:

(5, 50374), (17, 50302), (Start: 30 @50275 has 26 MA's), (50, 50200), (86, 50026), (117, 49894), (121, 49864), (125, 49855), (127, 49846), (133, 49819), (140, 49792), (150, 49747), (156, 49714), (159, 49702), (168, 49684), (191, 49603), (210, 49525),

Gene: SuperSonics_88 Start: 54521, Stop: 55606, Start Num: 34

Candidate Starts for SuperSonics_88:

(Start: 34 @54521 has 5 MA's), (51, 54578), (52, 54581), (56, 54611), (67, 54668), (72, 54683), (98, 54812), (107, 54836), (117, 54890), (120, 54914), (153, 55058), (154, 55064), (156, 55070), (158, 55079), (159, 55082), (163, 55100), (173, 55127), (185, 55187), (195, 55235), (207, 55283), (212, 55301), (223, 55361), (225, 55382), (235, 55517), (236, 55532),

Gene: SuperSulley_67 Start: 52253, Stop: 51390, Start Num: 30

Candidate Starts for SuperSulley_67:

(7, 52331), (Start: 30 @52253 has 26 MA's), (64, 52091), (94, 51965), (125, 51824), (133, 51791), (140, 51764), (142, 51758), (153, 51698), (159, 51674), (168, 51656), (185, 51602), (193, 51572), (201, 51527),

Gene: SuperheroCarly_60 Start: 44606, Stop: 45466, Start Num: 41

Candidate Starts for SuperheroCarly_60:

(12, 44534), (Start: 41 @44606 has 24 MA's), (49, 44651), (52, 44663), (53, 44681), (56, 44693), (59, 44717), (60, 44720), (95, 44873), (98, 44894), (101, 44903), (105, 44909), (122, 44999), (124, 45002), (126, 45011), (131, 45032), (156, 45143), (159, 45155), (163, 45173), (181, 45224), (184, 45233), (190, 45263), (191, 45266),

Gene: Suzy_56 Start: 43075, Stop: 44001, Start Num: 31

Candidate Starts for Suzy_56:

(Start: 31 @43075 has 9 MA's), (51, 43132), (56, 43165), (90, 43315), (92, 43324), (98, 43369), (105, 43384), (108, 43396), (111, 43408), (118, 43447), (119, 43462), (128, 43495), (153, 43606), (154, 43612), (159, 43630), (166, 43654), (168, 43660), (175, 43684), (178, 43690), (181, 43714), (196, 43783), (201, 43807), (228, 43972),

Gene: Terapin_57 Start: 41806, Stop: 42735, Start Num: 31

Candidate Starts for Terapin_57:

(Start: 31 @41806 has 9 MA's), (51, 41863), (56, 41896), (90, 42046), (92, 42055), (95, 42079), (98, 42100), (105, 42115), (108, 42127), (111, 42139), (118, 42178), (119, 42193), (128, 42226), (153, 42337), (154, 42343), (159, 42361), (166, 42385), (168, 42391), (178, 42421), (181, 42445), (201, 42538), (228, 42706),

Gene: Thoth_59 Start: 44488, Stop: 45348, Start Num: 41

Candidate Starts for Thoth_59:

(12, 44416), (Start: 41 @44488 has 24 MA's), (49, 44533), (52, 44545), (53, 44563), (56, 44575), (59, 44599), (60, 44602), (95, 44755), (98, 44776), (101, 44785), (105, 44791), (122, 44881), (124, 44884), (126, 44893), (131, 44914), (156, 45025), (159, 45037), (163, 45055), (181, 45106), (184, 45115), (190, 45145), (191, 45148),

Gene: Thumb_73 Start: 52573, Stop: 53652, Start Num: 37

Candidate Starts for Thumb_73:

(Start: 37 @52573 has 11 MA's), (42, 52579), (50, 52627), (72, 52735), (82, 52783), (88, 52813), (98, 52870), (101, 52879), (105, 52885), (126, 52987), (134, 53020), (138, 53035), (147, 53074), (154, 53113), (159, 53131), (163, 53149), (164, 53152), (168, 53161), (185, 53227), (190, 53251), (229, 53443), (237, 53590), (238, 53593), (241, 53632), (243, 53641),

Gene: Tillicus_62 Start: 44587, Stop: 45672, Start Num: 33

Candidate Starts for Tillicus_62:

(Start: 33 @44587 has 39 MA's), (53, 44668), (56, 44680), (59, 44704), (63, 44719), (75, 44767), (97, 44860), (98, 44869), (101, 44878), (130, 45001), (135, 45022), (143, 45049), (159, 45130), (163, 45148), (171, 45169), (177, 45190), (188, 45247), (207, 45331),

Gene: Tracker_65 Start: 50870, Stop: 50052, Start Num: 30

Candidate Starts for Tracker_65:

(17, 50897), (Start: 30 @50870 has 26 MA's), (50, 50798), (94, 50576), (125, 50435), (127, 50426), (140, 50375), (148, 50339), (159, 50285), (168, 50267), (174, 50252),

Gene: Troll4_59 Start: 44619, Stop: 45479, Start Num: 41

Candidate Starts for Troll4_59:

(12, 44547), (Start: 41 @44619 has 24 MA's), (49, 44664), (52, 44676), (53, 44694), (56, 44706), (59, 44730), (60, 44733), (95, 44886), (98, 44907), (101, 44916), (105, 44922), (122, 45012), (124, 45015), (126, 45024), (131, 45045), (156, 45156), (159, 45168), (163, 45186), (181, 45237), (184, 45246), (190, 45276), (191, 45279),

Gene: Turuncu_68 Start: 51816, Stop: 51037, Start Num: 18

Candidate Starts for Turuncu_68:

(Start: 18 @51816 has 12 MA's), (50, 51729), (121, 51390), (125, 51381), (133, 51348), (140, 51321), (148, 51291), (159, 51237), (160, 51231), (168, 51219), (171, 51213), (184, 51177), (193, 51141),

Gene: Visconti_60 Start: 44499, Stop: 45359, Start Num: 41

Candidate Starts for Visconti_60:

(12, 44427), (Start: 41 @44499 has 24 MA's), (49, 44544), (52, 44556), (53, 44574), (56, 44586), (59, 44610), (60, 44613), (95, 44766), (98, 44787), (101, 44796), (105, 44802), (122, 44892), (124, 44895), (126, 44904), (131, 44925), (156, 45036), (159, 45048), (163, 45066), (181, 45117), (184, 45126), (190, 45156), (191, 45159),

Gene: WaldoWhy_61 Start: 44552, Stop: 45412, Start Num: 41

Candidate Starts for WaldoWhy_61:

(12, 44480), (Start: 41 @44552 has 24 MA's), (49, 44597), (52, 44609), (53, 44627), (56, 44639), (59, 44663), (60, 44666), (95, 44819), (98, 44840), (101, 44849), (105, 44855), (122, 44945), (124, 44948), (126, 44957), (131, 44978), (156, 45089), (159, 45101), (163, 45119), (181, 45170), (184, 45179), (190, 45209), (191, 45212),

Gene: Weiss13_70 Start: 52669, Stop: 53499, Start Num: 28

Candidate Starts for Weiss13_70:

(Start: 28 @52669 has 10 MA's), (48, 52714), (51, 52744), (56, 52777), (59, 52801), (72, 52849), (76, 52870), (95, 52963), (104, 52993), (106, 52996), (110, 53008), (129, 53092), (136, 53122), (154, 53206), (156, 53212), (159, 53224), (163, 53242), (169, 53269), (170, 53272), (191, 53368), (195, 53389), (201, 53416),

Gene: Wheezy_65 Start: 51084, Stop: 50263, Start Num: 30

Candidate Starts for Wheezy_65:

(17, 51111), (Start: 30 @51084 has 26 MA's), (50, 51012), (94, 50790), (125, 50649), (127, 50640), (140, 50589), (148, 50553), (159, 50499), (168, 50481), (174, 50466),

Gene: WhoseManz_65 Start: 48102, Stop: 47305, Start Num: 30

Candidate Starts for WhoseManz_65:

(Start: 30 @48102 has 26 MA's), (50, 48027), (117, 47721), (121, 47691), (125, 47682), (127, 47673), (133, 47646), (140, 47619), (150, 47574), (156, 47541), (159, 47529), (168, 47511), (191, 47430), (210, 47352),

Gene: Wojtek_63 Start: 44323, Stop: 45414, Start Num: 33

Candidate Starts for Wojtek_63:

(Start: 33 @44323 has 39 MA's), (53, 44404), (56, 44416), (63, 44455), (75, 44503), (97, 44596), (98, 44605), (101, 44614), (130, 44737), (135, 44758), (143, 44785), (159, 44866), (163, 44884), (171, 44905), (188, 44983), (207, 45067), (220, 45145), (230, 45232),

Gene: Xenia2_66 Start: 44090, Stop: 45202, Start Num: 33

Candidate Starts for Xenia2_66:

(Start: 33 @44090 has 39 MA's), (56, 44186), (63, 44225), (75, 44273), (95, 44354), (97, 44366), (98, 44375), (101, 44384), (135, 44528), (159, 44636), (163, 44654), (171, 44675), (178, 44699), (179,

44702), (188, 44753), (219, 44894), (240, 45170),

Gene: Yelo_69 Start: 53048, Stop: 53878, Start Num: 28

Candidate Starts for Yelo_69:

(Start: 28 @53048 has 10 MA's), (48, 53093), (51, 53123), (56, 53156), (59, 53180), (72, 53228), (76, 53249), (95, 53342), (104, 53372), (106, 53375), (110, 53387), (129, 53471), (136, 53501), (154, 53585), (156, 53591), (159, 53603), (163, 53621), (169, 53648), (170, 53651), (191, 53747), (195, 53768), (201, 53795),

Gene: Yikes_69 Start: 46336, Stop: 47406, Start Num: 33

Candidate Starts for Yikes_69:

(Start: 33 @46336 has 39 MA's), (63, 46468), (75, 46516), (97, 46609), (98, 46618), (101, 46627), (130, 46750), (135, 46771), (143, 46798), (159, 46879), (163, 46897), (171, 46918), (188, 46996), (207, 47080), (230, 47245), (240, 47377),

Gene: Yndexa_66 Start: 50275, Stop: 49478, Start Num: 30

Candidate Starts for Yndexa_66:

(5, 50374), (17, 50302), (Start: 30 @50275 has 26 MA's), (50, 50200), (86, 50026), (117, 49894), (121, 49864), (125, 49855), (127, 49846), (133, 49819), (140, 49792), (150, 49747), (156, 49714), (159, 49702), (168, 49684), (191, 49603), (210, 49525),

Gene: Zany_65 Start: 45737, Stop: 46807, Start Num: 33

Candidate Starts for Zany_65:

(Start: 33 @45737 has 39 MA's), (63, 45869), (75, 45917), (97, 46010), (98, 46019), (101, 46028), (130, 46151), (135, 46172), (143, 46199), (159, 46280), (163, 46298), (171, 46319), (188, 46397), (207, 46481), (230, 46646), (240, 46778),

Gene: Zenon_72 Start: 52992, Stop: 53822, Start Num: 28

Candidate Starts for Zenon_72:

(Start: 28 @52992 has 10 MA's), (48, 53037), (51, 53067), (56, 53100), (59, 53124), (72, 53172), (76, 53193), (95, 53286), (104, 53316), (106, 53319), (129, 53415), (136, 53445), (154, 53529), (156, 53535), (159, 53547), (163, 53565), (169, 53592), (170, 53595), (191, 53691), (195, 53712), (201, 53739),