Pham 347494


1: Tyson_3 + 4
2: Wyatt2_3 + 12
3: LeBron_3 + 1
4: Nicholasp3_3 + 30
5: Kahlid_3 + 1
6: GuuelaD_3
7: Zakai_3 + 1
8: Archie_3
9: Claus_3
10: Krypton555_3 + 12
11: Ellson_3 + 3
12: MiniMac_3 + 1
13: Samty_3
14: Finnry_3
15: Douzhi_3 + 4
16: Bromden_3 + 1
17: Douge_3
18: ChutneyChips_3

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 347494 Report

This analysis was run 11/14/26 on database version 672.

Pham number 347494 has 88 members, 18 are drafts.

Phages represented in each track:
• Track 1 : Tyson_3, AvadaKedavra_3, JoeDirt_3, Poochiewood_3, OhShagHennessy_3
• Track 2 : Wyatt2_3, Zaria_3, CicholasNage_3, Wamburgrxpress_3, Appletree2_3, Rose5_3, Calm_3, MAckerman_3, Enceladus_3, DirkDirk_3, Silverleaf_3, Halena_3, Acquire49_3
• Track 3 : LeBron_3, UPIE_3
• Track 4 : Nicholasp3_3, Underpass_3, Vetrix_3, Soap141_3, BobsGarage_3, Lynnae_3, OverPar_3, Netyap_3, Miley16_3, Gabriela_3, LilDestine_3, Faith1_3, Winky_3, Finemlucis_3, Lewan_3, Loadrie_3, Molivier_3, Gardann_3, DrSeegs_3, Wilder_3, Breezona_3, SoJulia_3, ChengKai98_3, Hiraya_3, MkaliMitinis3_3, Itos_3, Hafay_3, BigCheese_3, Crossroads_3, Wigglewiggle_3, Rumpelstiltskin_3
• Track 5 : Kahlid_3, Sarshaun_3
• Track 6 : GuuelaD_3
• Track 7 : Zakai_3, Rossetti_3
• Track 8 : Archie_3
• Track 9 : Claus_3
• Track 10 : Krypton555_3, Bellis_3, DuncansLeg_3, Kingsolomon_3, Nicholas_3, Lumos_3, Red305_3, TriFive_3, Snenia_3, MsGreen_3, Jubie_3, Jobypre_3, Clautastrophe_3
• Track 11 : Ellson_3, Moostard_3, Whirlwind_4, LiyuLake_3
• Track 12 : MiniMac_3, Lolly9_3
• Track 13 : Samty_3
• Track 14 : Finnry_3
• Track 15 : Douzhi_3, BrainDrainer_3, Quby_3, PYPDinur_3, Sheng711_3
• Track 16 : Bromden_3, Chaser_3
• Track 17 : Douge_3
• Track 18 : ChutneyChips_3

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

The start number called the most often in the published annotations is 2, it was called in 56 of the 70 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

• Acquire49_3, Appletree2_3, Archie_3, Bellis_3, BigCheese_3, BobsGarage_3, Breezona_3, Bromden_3, Calm_3, Chaser_3, ChengKai98_3, CicholasNage_3, Claus_3, Clautastrophe_3, Crossroads_3, DirkDirk_3, DrSeegs_3, DuncansLeg_3, Enceladus_3, Faith1_3, Finemlucis_3, Finnry_3, Gabriela_3, Gardann_3, GuuelaD_3, Hafay_3, Halena_3, Hiraya_3, Itos_3, Jobypre_3, Jubie_3, Kingsolomon_3, Krypton555_3, Lewan_3, LilDestine_3, Loadrie_3, Lumos_3, Lynnae_3, MAckerman_3, Miley16_3, MkaliMitinis3_3, Molivier_3, MsGreen_3, Netyap_3, Nicholas_3, Nicholasp3_3, OverPar_3, Red305_3, Rose5_3, Rossetti_3, Rumpelstiltskin_3, Silverleaf_3, Snenia_3, SoJulia_3, Soap141_3, TriFive_3, Underpass_3, Vetrix_3, Wamburgrxpress_3, Wigglewiggle_3, Wilder_3, Winky_3, Wyatt2_3, Zakai_3, Zaria_3,

Genes that have the "Most Annotated" start but do not call it:
• AvadaKedavra_3, BrainDrainer_3, ChutneyChips_3, Douge_3, Douzhi_3, Ellson_3, JoeDirt_3, Kahlid_3, LeBron_3, LiyuLake_3, Moostard_3, OhShagHennessy_3, PYPDinur_3, Poochiewood_3, Quby_3, Samty_3, Sarshaun_3, Sheng711_3, Tyson_3, UPIE_3, Whirlwind_4,

Genes that do not have the "Most Annotated" start:
• Lolly9_3, MiniMac_3,

Summary by start number:

Start 1:
• Found in 2 of 88 (2.3%) of genes in pham
• Manual Annotations of this start: 2 of 70
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Lolly9_3 (L3), MiniMac_3 (L3),

Start 2:
• Found in 86 of 88 (97.7%) of genes in pham
• Manual Annotations of this start: 56 of 70
• Called 75.6% of time when present
• Phage (with cluster) where this start called: Acquire49_3 (L1), Appletree2_3 (L1), Archie_3 (L2), Bellis_3 (L3), BigCheese_3 (L2), BobsGarage_3 (L2), Breezona_3 (L2), Bromden_3 (L4), Calm_3 (L1), Chaser_3 (L4), ChengKai98_3 (L2), CicholasNage_3 (L1), Claus_3 (L2), Clautastrophe_3 (L3), Crossroads_3 (L2), DirkDirk_3 (L1), DrSeegs_3 (L2), DuncansLeg_3 (L3), Enceladus_3 (L1), Faith1_3 (L2), Finemlucis_3 (L2), Finnry_3 (L3), Gabriela_3 (L2), Gardann_3 (L2), GuuelaD_3 (L2), Hafay_3 (L2), Halena_3 (L1), Hiraya_3 (L2), Itos_3 (L2), Jobypre_3 (L3), Jubie_3 (L3), Kingsolomon_3 (L3), Krypton555_3 (L3), Lewan_3 (L2), LilDestine_3 (L2), Loadrie_3 (L2), Lumos_3 (L3), Lynnae_3 (L2), MAckerman_3 (L1), Miley16_3 (L2), MkaliMitinis3_3 (L2), Molivier_3 (L2), MsGreen_3 (L3), Netyap_3 (L2), Nicholas_3 (L3), Nicholasp3_3 (L2), OverPar_3 (L2), Red305_3 (L3), Rose5_3 (L1), Rossetti_3 (L2), Rumpelstiltskin_3 (L2), Silverleaf_3 (L1), Snenia_3 (L3), SoJulia_3 (L2), Soap141_3 (L2), TriFive_3 (L3), Underpass_3 (L2), Vetrix_3 (L2), Wamburgrxpress_3 (L1), Wigglewiggle_3 (L2), Wilder_3 (L2), Winky_3 (L2), Wyatt2_3 (L1), Zakai_3 (L2), Zaria_3 (L1),

Start 3:
• Found in 88 of 88 (100.0%) of genes in pham
• Manual Annotations of this start: 7 of 70
• Called 18.2% of time when present

• Phage (with cluster) where this start called: AvadaKedavra_3 (L1), BrainDrainer_3 (L4), Douzhi_3 (L4), Ellson_3 (L3), JoeDirt_3 (L1), Kahlid_3 (L2), LiyuLake_3 (L3), Moostard_3 (L3), OhShagHennessy_3 (L1), PYPDinur_3 (L4), Poochiewood_3 (L1), Quby_3 (L4), Sarshaun_3 (L2), Sheng711_3 (L4), Tyson_3 (L1), Whirlwind_4 (L3),

Start 4:
• Found in 86 of 88 (97.7%) of genes in pham
• Manual Annotations of this start: 5 of 70
• Called 5.8% of time when present
• Phage (with cluster) where this start called: ChutneyChips_3 (L4), Douge_3 (L4), LeBron_3 (L1), Samty_3 (L3), UPIE_3 (L1),

Summary by clusters:

There are 4 clusters represented in this pham: L4, L2, L3, L1,

Info for manual annotations of cluster L1:
•Start number 2 was manually annotated 13 times for cluster L1.
•Start number 3 was manually annotated 4 times for cluster L1.
•Start number 4 was manually annotated 2 times for cluster L1.

Info for manual annotations of cluster L2:
•Start number 2 was manually annotated 28 times for cluster L2.
•Start number 3 was manually annotated 1 time for cluster L2.

Info for manual annotations of cluster L3:
•Start number 1 was manually annotated 2 times for cluster L3.
•Start number 2 was manually annotated 13 times for cluster L3.
•Start number 3 was manually annotated 2 times for cluster L3.
•Start number 4 was manually annotated 1 time for cluster L3.

Info for manual annotations of cluster L4:
•Start number 2 was manually annotated 2 times for cluster L4.
•Start number 4 was manually annotated 2 times for cluster L4.

Gene Information:

Gene: Acquire49_3 Start: 849, Stop: 1052, Start Num: 2
Candidate Starts for Acquire49_3:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (5, 888), (10, 1005),

Gene: Appletree2_3 Start: 822, Stop: 1025, Start Num: 2
Candidate Starts for Appletree2_3:
(Start: 2 @822 has 56 MA's), (Start: 3 @831 has 7 MA's), (Start: 4 @834 has 5 MA's), (5, 861), (10, 978),

Gene: Archie_3 Start: 831, Stop: 1034, Start Num: 2
Candidate Starts for Archie_3:
(Start: 2 @831 has 56 MA's), (Start: 3 @840 has 7 MA's), (Start: 4 @843 has 5 MA's), (6, 930), (7, 969),

Gene: AvadaKedavra_3 Start: 858, Stop: 1052, Start Num: 3
Candidate Starts for AvadaKedavra_3:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (5, 888), (10, 1005),

Gene: Bellis_3 Start: 850, Stop: 1035, Start Num: 2
Candidate Starts for Bellis_3:
(Start: 2 @850 has 56 MA's), (Start: 3 @859 has 7 MA's), (Start: 4 @862 has 5 MA's), (8, 997), (11, 1021),

Gene: BigCheese_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for BigCheese_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: BobsGarage_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for BobsGarage_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: BrainDrainer_3 Start: 613, Stop: 771, Start Num: 3
Candidate Starts for BrainDrainer_3:
(Start: 2 @604 has 56 MA's), (Start: 3 @613 has 7 MA's), (Start: 4 @616 has 5 MA's),

Gene: Breezona_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Breezona_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Bromden_3 Start: 603, Stop: 815, Start Num: 2
Candidate Starts for Bromden_3:
(Start: 2 @603 has 56 MA's), (Start: 3 @612 has 7 MA's), (Start: 4 @615 has 5 MA's), (6, 702), (9, 759),

Gene: Calm_3 Start: 849, Stop: 1052, Start Num: 2
Candidate Starts for Calm_3:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (5, 888), (10, 1005),

Gene: Chaser_3 Start: 604, Stop: 816, Start Num: 2
Candidate Starts for Chaser_3:
(Start: 2 @604 has 56 MA's), (Start: 3 @613 has 7 MA's), (Start: 4 @616 has 5 MA's), (6, 703), (9, 760),

Gene: ChengKai98_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for ChengKai98_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: ChutneyChips_3 Start: 616, Stop: 816, Start Num: 4
Candidate Starts for ChutneyChips_3:

(Start: 2 @604 has 56 MA's), (Start: 3 @613 has 7 MA's), (Start: 4 @616 has 5 MA's), (6, 703), (9, 760),

Gene: CicholasNage_3 Start: 850, Stop: 1053, Start Num: 2
Candidate Starts for CicholasNage_3:
(Start: 2 @850 has 56 MA's), (Start: 3 @859 has 7 MA's), (Start: 4 @862 has 5 MA's), (5, 889), (10, 1006),

Gene: Claus_3 Start: 878, Stop: 1081, Start Num: 2
Candidate Starts for Claus_3:
(Start: 2 @878 has 56 MA's), (Start: 3 @887 has 7 MA's), (Start: 4 @890 has 5 MA's), (6, 977), (7, 1016),

Gene: Clautastrophe_3 Start: 860, Stop: 1048, Start Num: 2
Candidate Starts for Clautastrophe_3:
(Start: 2 @860 has 56 MA's), (Start: 3 @869 has 7 MA's), (Start: 4 @872 has 5 MA's), (8, 1007), (11, 1031),

Gene: Crossroads_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Crossroads_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: DirkDirk_3 Start: 850, Stop: 1053, Start Num: 2
Candidate Starts for DirkDirk_3:
(Start: 2 @850 has 56 MA's), (Start: 3 @859 has 7 MA's), (Start: 4 @862 has 5 MA's), (5, 889), (10, 1006),

Gene: Douge_3 Start: 616, Stop: 771, Start Num: 4
Candidate Starts for Douge_3:
(Start: 2 @604 has 56 MA's), (Start: 3 @613 has 7 MA's), (Start: 4 @616 has 5 MA's),

Gene: Douzhi_3 Start: 613, Stop: 771, Start Num: 3
Candidate Starts for Douzhi_3:
(Start: 2 @604 has 56 MA's), (Start: 3 @613 has 7 MA's), (Start: 4 @616 has 5 MA's),

Gene: DrSeegs_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for DrSeegs_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: DuncansLeg_3 Start: 863, Stop: 1051, Start Num: 2
Candidate Starts for DuncansLeg_3:
(Start: 2 @863 has 56 MA's), (Start: 3 @872 has 7 MA's), (Start: 4 @875 has 5 MA's), (8, 1010), (11, 1034),

Gene: Ellson_3 Start: 881, Stop: 1060, Start Num: 3
Candidate Starts for Ellson_3:
(Start: 2 @872 has 56 MA's), (Start: 3 @881 has 7 MA's), (Start: 4 @884 has 5 MA's), (8, 1019), (11, 1043),

Gene: Enceladus_3 Start: 850, Stop: 1053, Start Num: 2
Candidate Starts for Enceladus_3:

(Start: 2 @850 has 56 MA's), (Start: 3 @859 has 7 MA's), (Start: 4 @862 has 5 MA's), (5, 889), (10, 1006),

Gene: Faith1_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Faith1_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Finemlucis_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Finemlucis_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Finnry_3 Start: 851, Stop: 1036, Start Num: 2
Candidate Starts for Finnry_3:
(Start: 2 @851 has 56 MA's), (Start: 3 @860 has 7 MA's), (Start: 4 @863 has 5 MA's), (8, 998), (11, 1022),

Gene: Gabriela_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Gabriela_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Gardann_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Gardann_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: GuuelaD_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for GuuelaD_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (5, 905), (6, 965), (7, 1004),

Gene: Hafay_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Hafay_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Halena_3 Start: 849, Stop: 1052, Start Num: 2
Candidate Starts for Halena_3:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (5, 888), (10, 1005),

Gene: Hiraya_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Hiraya_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Itos_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Itos_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Jobypre_3 Start: 860, Stop: 1048, Start Num: 2
Candidate Starts for Jobypre_3:
(Start: 2 @860 has 56 MA's), (Start: 3 @869 has 7 MA's), (Start: 4 @872 has 5 MA's), (8, 1007), (11, 1031),

Gene: JoeDirt_3 Start: 859, Stop: 1053, Start Num: 3
Candidate Starts for JoeDirt_3:
(Start: 2 @850 has 56 MA's), (Start: 3 @859 has 7 MA's), (Start: 4 @862 has 5 MA's), (5, 889), (10, 1006),

Gene: Jubie_3 Start: 860, Stop: 1048, Start Num: 2
Candidate Starts for Jubie_3:
(Start: 2 @860 has 56 MA's), (Start: 3 @869 has 7 MA's), (Start: 4 @872 has 5 MA's), (8, 1007), (11, 1031),

Gene: Kahlid_3 Start: 875, Stop: 1069, Start Num: 3
Candidate Starts for Kahlid_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Kingsolomon_3 Start: 860, Stop: 1048, Start Num: 2
Candidate Starts for Kingsolomon_3:
(Start: 2 @860 has 56 MA's), (Start: 3 @869 has 7 MA's), (Start: 4 @872 has 5 MA's), (8, 1007), (11, 1031),

Gene: Krypton555_3 Start: 849, Stop: 1034, Start Num: 2
Candidate Starts for Krypton555_3:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (8, 996), (11, 1020),

Gene: LeBron_3 Start: 862, Stop: 1053, Start Num: 4
Candidate Starts for LeBron_3:
(Start: 2 @850 has 56 MA's), (Start: 3 @859 has 7 MA's), (Start: 4 @862 has 5 MA's), (5, 889), (10, 1006),

Gene: Lewan_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Lewan_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: LilDestine_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for LilDestine_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: LiyuLake_3 Start: 872, Stop: 1051, Start Num: 3
Candidate Starts for LiyuLake_3:
(Start: 2 @863 has 56 MA's), (Start: 3 @872 has 7 MA's), (Start: 4 @875 has 5 MA's), (8, 1010), (11, 1034),

Gene: Loadrie_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Loadrie_3:

(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Lolly9_3 Start: 857, Stop: 1045, Start Num: 1
Candidate Starts for Lolly9_3:
(Start: 1 @857 has 2 MA's), (Start: 3 @869 has 7 MA's), (8, 1007), (11, 1031),

Gene: Lumos_3 Start: 860, Stop: 1048, Start Num: 2
Candidate Starts for Lumos_3:
(Start: 2 @860 has 56 MA's), (Start: 3 @869 has 7 MA's), (Start: 4 @872 has 5 MA's), (8, 1007), (11, 1031),

Gene: Lynnae_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Lynnae_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: MAckerman_3 Start: 849, Stop: 1052, Start Num: 2
Candidate Starts for MAckerman_3:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (5, 888), (10, 1005),

Gene: Miley16_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Miley16_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: MiniMac_3 Start: 857, Stop: 1045, Start Num: 1
Candidate Starts for MiniMac_3:
(Start: 1 @857 has 2 MA's), (Start: 3 @869 has 7 MA's), (8, 1007), (11, 1031),

Gene: MkaliMitinis3_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for MkaliMitinis3_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Molivier_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Molivier_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Moostard_3 Start: 859, Stop: 1035, Start Num: 3
Candidate Starts for Moostard_3:
(Start: 2 @850 has 56 MA's), (Start: 3 @859 has 7 MA's), (Start: 4 @862 has 5 MA's), (8, 997), (11, 1021),

Gene: MsGreen_3 Start: 860, Stop: 1048, Start Num: 2
Candidate Starts for MsGreen_3:
(Start: 2 @860 has 56 MA's), (Start: 3 @869 has 7 MA's), (Start: 4 @872 has 5 MA's), (8, 1007), (11, 1031),

Gene: Netyap_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Netyap_3:

(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Nicholas_3 Start: 860, Stop: 1048, Start Num: 2
Candidate Starts for Nicholas_3:
(Start: 2 @860 has 56 MA's), (Start: 3 @869 has 7 MA's), (Start: 4 @872 has 5 MA's), (8, 1007), (11, 1031),

Gene: Nicholasp3_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Nicholasp3_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: OhShagHennessy_3 Start: 831, Stop: 1025, Start Num: 3
Candidate Starts for OhShagHennessy_3:
(Start: 2 @822 has 56 MA's), (Start: 3 @831 has 7 MA's), (Start: 4 @834 has 5 MA's), (5, 861), (10, 978),

Gene: OverPar_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for OverPar_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: PYPDinur_3 Start: 613, Stop: 771, Start Num: 3
Candidate Starts for PYPDinur_3:
(Start: 2 @604 has 56 MA's), (Start: 3 @613 has 7 MA's), (Start: 4 @616 has 5 MA's),

Gene: Poochiewood_3 Start: 858, Stop: 1052, Start Num: 3
Candidate Starts for Poochiewood_3:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (5, 888), (10, 1005),

Gene: Quby_3 Start: 613, Stop: 771, Start Num: 3
Candidate Starts for Quby_3:
(Start: 2 @604 has 56 MA's), (Start: 3 @613 has 7 MA's), (Start: 4 @616 has 5 MA's),

Gene: Red305_3 Start: 860, Stop: 1048, Start Num: 2
Candidate Starts for Red305_3:
(Start: 2 @860 has 56 MA's), (Start: 3 @869 has 7 MA's), (Start: 4 @872 has 5 MA's), (8, 1007), (11, 1031),

Gene: Rose5_3 Start: 849, Stop: 1052, Start Num: 2
Candidate Starts for Rose5_3:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (5, 888), (10, 1005),

Gene: Rossetti_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Rossetti_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Rumpelstiltskin_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Rumpelstiltskin_3:

(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Samty_3 Start: 862, Stop: 1035, Start Num: 4
Candidate Starts for Samty_3:
(Start: 2 @850 has 56 MA's), (Start: 3 @859 has 7 MA's), (Start: 4 @862 has 5 MA's), (8, 997), (11, 1021),

Gene: Sarshaun_3 Start: 875, Stop: 1069, Start Num: 3
Candidate Starts for Sarshaun_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Sheng711_3 Start: 613, Stop: 771, Start Num: 3
Candidate Starts for Sheng711_3:
(Start: 2 @604 has 56 MA's), (Start: 3 @613 has 7 MA's), (Start: 4 @616 has 5 MA's),

Gene: Silverleaf_3 Start: 849, Stop: 1052, Start Num: 2
Candidate Starts for Silverleaf_3:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (5, 888), (10, 1005),

Gene: Snenia_3 Start: 860, Stop: 1048, Start Num: 2
Candidate Starts for Snenia_3:
(Start: 2 @860 has 56 MA's), (Start: 3 @869 has 7 MA's), (Start: 4 @872 has 5 MA's), (8, 1007), (11, 1031),

Gene: SoJulia_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for SoJulia_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Soap141_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Soap141_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: TriFive_3 Start: 860, Stop: 1048, Start Num: 2
Candidate Starts for TriFive_3:
(Start: 2 @860 has 56 MA's), (Start: 3 @869 has 7 MA's), (Start: 4 @872 has 5 MA's), (8, 1007), (11, 1031),

Gene: Tyson_3 Start: 858, Stop: 1052, Start Num: 3
Candidate Starts for Tyson_3:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (5, 888), (10, 1005),

Gene: UPIE_3 Start: 862, Stop: 1053, Start Num: 4
Candidate Starts for UPIE_3:
(Start: 2 @850 has 56 MA's), (Start: 3 @859 has 7 MA's), (Start: 4 @862 has 5 MA's), (5, 889), (10, 1006),

Gene: Underpass_3 Start: 866, Stop: 1069, Start Num: 2

Candidate Starts for Underpass_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Vetrix_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Vetrix_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Wamburgrxpress_3 Start: 849, Stop: 1052, Start Num: 2
Candidate Starts for Wamburgrxpress_3:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (5, 888), (10, 1005),

Gene: Whirlwind_4 Start: 858, Stop: 1034, Start Num: 3
Candidate Starts for Whirlwind_4:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (8, 996), (11, 1020),

Gene: Wigglewiggle_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Wigglewiggle_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Wilder_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Wilder_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Winky_3 Start: 866, Stop: 1069, Start Num: 2
Candidate Starts for Winky_3:
(Start: 2 @866 has 56 MA's), (Start: 3 @875 has 7 MA's), (Start: 4 @878 has 5 MA's), (6, 965), (7, 1004),

Gene: Wyatt2_3 Start: 849, Stop: 1052, Start Num: 2
Candidate Starts for Wyatt2_3:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (5, 888), (10, 1005),

Gene: Zakai_3 Start: 854, Stop: 1057, Start Num: 2
Candidate Starts for Zakai_3:
(Start: 2 @854 has 56 MA's), (Start: 3 @863 has 7 MA's), (Start: 4 @866 has 5 MA's), (6, 953), (7, 992),

Gene: Zaria_3 Start: 849, Stop: 1052, Start Num: 2
Candidate Starts for Zaria_3:
(Start: 2 @849 has 56 MA's), (Start: 3 @858 has 7 MA's), (Start: 4 @861 has 5 MA's), (5, 888), (10, 1005),