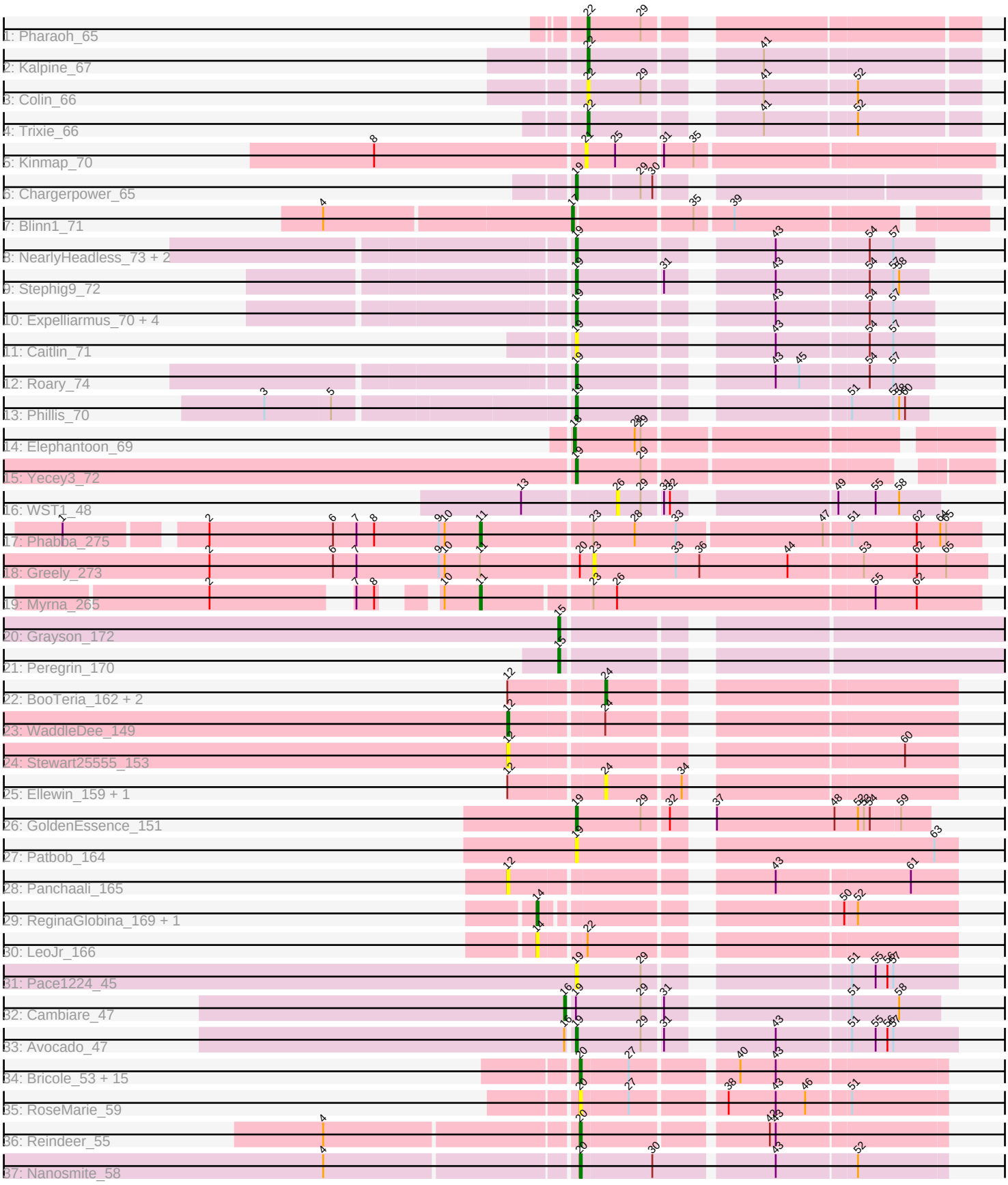
Pham 283814


1: Pharaoh_65
2: Kalpine_67
3: Colin_66
4: Trixie_66
5: Kinmap_70
6: Chargerpower_65
7: Blinn1_71
8: NearlyHeadless_73 + 2
9: Stephig9_72
10: Expelliarmus_70 + 4
11: Caitlin_71
12: Roary_74
13: Phillis_70
14: Elephantoon_69
15: Yecey3_72
16: WST1_48
17: Phabba_275
18: Greely_273
19: Myrna_265
20: Grayson_172
21: Peregrin_170
22: BooTeria_162 + 2
23: WaddleDee_149
24: Stewart25555_153
25: Ellewin_159 + 1
26: GoldenEssence_151
27: Patbob_164
28: Panchaali_165
29: ReginaGlobina_169 + 1
30: LeoJr_166
31: Pace1224_45
32: Cambiare_47
33: Avocado_47
34: Bricole_53 + 15
35: RoseMarie_59
36: Reindeer_55
37: Nanosmite_58

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 283814 Report

This analysis was run 02/23/26 on database version 636.

Pham number 283814 has 62 members, 18 are drafts.

Phages represented in each track:
- Track 1 : Pharaoh_65
- Track 2 : Kalpine_67
- Track 3 : Colin_66
- Track 4 : Trixie_66
- Track 5 : Kinmap_70
- Track 6 : Chargerpower_65
- Track 7 : Blinn1_71
- Track 8 : NearlyHeadless_73, Saintus_68, Dixon_72
- Track 9 : Stephig9_72
- Track 10 : Expelliarmus_70, Groundhog_72, Astro_73, Danforth_73, Smeadley_73
- Track 11 : Caitlin_71
- Track 12 : Roary_74
- Track 13 : Phillis_70
- Track 14 : Elephantoon_69
- Track 15 : Yecey3_72
- Track 16 : WST1_48
- Track 17 : Phabba_275
- Track 18 : Greely_273
- Track 19 : Myrna_265
- Track 20 : Grayson_172
- Track 21 : Peregrin_170
- Track 22 : BooTeria_162, Emmetator_156, DunneganBoMo_153
- Track 23 : WaddleDee_149
- Track 24 : Stewart25555_153
- Track 25 : Ellewin_159, KSunshine22_158
- Track 26 : GoldenEssence_151
- Track 27 : Patbob_164
- Track 28 : Panchaali_165
- Track 29 : ReginaGlobina_169, Atuin_156
- Track 30 : LeoJr_166
- Track 31 : Pace1224_45
- Track 32 : Cambiare_47
- Track 33 : Avocado_47
- Track 34 : Bricole_53, Dulcita_54, Glaske16_54, Diminimus_54, FreakyGoo_54, KleverKiS_54, Auspice_53, IPhane7_53, Bongo_53, Skinny_54, SlimJimmy_52, TpudiCK_55, PegLeg_53, LilhomieP_52, Izel_54, TyDawg_53
- Track 35 : RoseMarie_59

• Track 36 : Reindeer_55
• Track 37 : Nanosmite_58

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

The start number called the most often in the published annotations is 20, it was called in 16 of the 44 non-draft genes in the pham.

Genes that call this "Most Annotated" start:
• Auspice_53, Bongo_53, Bricole_53, Diminimus_54, Dulcita_54, FreakyGoo_54, Glaske16_54, IPhane7_53, Izel_54, KleverKiS_54, LilhomieP_52, Nanosmite_58, PegLeg_53, Reindeer_55, RoseMarie_59, Skinny_54, SlimJimmy_52, TpudiCK_55, TyDawg_53,

Genes that have the "Most Annotated" start but do not call it:
• Greely_273,

Genes that do not have the "Most Annotated" start:
• Astro_73, Atuin_156, Avocado_47, Blinn1_71, BooTeria_162, Caitlin_71, Cambiare_47, Chargerpower_65, Colin_66, Danforth_73, Dixon_72, DunneganBoMo_153, Elephantoon_69, Ellewin_159, Emmetator_156, Expelliarmus_70, GoldenEssence_151, Grayson_172, Groundhog_72, KSunshine22_158, Kalpine_67, Kinmap_70, LeoJr_166, Myrna_265, NearlyHeadless_73, Pace1224_45, Panchaali_165, Patbob_164, Peregrin_170, Phabba_275, Pharaoh_65, Phillis_70, ReginaGlobina_169, Roary_74, Saintus_68, Smeadley_73, Stephig9_72, Stewart25555_153, Trixie_66, WST1_48, WaddleDee_149, Yecey3_72,

Summary by start number:

Start 11:
• Found in 3 of 62 (4.8%) of genes in pham
• Manual Annotations of this start: 2 of 44
• Called 66.7% of time when present
• Phage (with cluster) where this start called: Myrna_265 (C2), Phabba_275 (C2),

Start 12:
• Found in 8 of 62 (12.9%) of genes in pham
• Manual Annotations of this start: 1 of 44
• Called 37.5% of time when present
• Phage (with cluster) where this start called: Panchaali_165 (FC), Stewart25555_153 (FC), WaddleDee_149 (FC),

Start 14:
• Found in 3 of 62 (4.8%) of genes in pham
• Manual Annotations of this start: 1 of 44
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Atuin_156 (FC), LeoJr_166 (FC), ReginaGlobina_169 (FC),

Start 15:
• Found in 2 of 62 (3.2%) of genes in pham
• Manual Annotations of this start: 2 of 44
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Grayson_172 (CB), Peregrin_170 (CB),

Start 16:
• Found in 2 of 62 (3.2%) of genes in pham
• Manual Annotations of this start: 1 of 44
• Called 50.0% of time when present
• Phage (with cluster) where this start called: Cambiare_47 (G2),

Start 17:
• Found in 1 of 62 (1.6%) of genes in pham
• Manual Annotations of this start: 1 of 44
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Blinn1_71 (A6),

Start 18:
• Found in 1 of 62 (1.6%) of genes in pham
• Manual Annotations of this start: 1 of 44
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Elephantoon_69 (A9),

Start 19:
• Found in 19 of 62 (30.6%) of genes in pham
• Manual Annotations of this start: 15 of 44
• Called 94.7% of time when present
• Phage (with cluster) where this start called: Astro_73 (A8), Avocado_47 (G2), Caitlin_71 (A8), Chargerpower_65 (A22), Danforth_73 (A8), Dixon_72 (A8), Expelliarmus_70 (A8), GoldenEssence_151 (FC), Groundhog_72 (A8), NearlyHeadless_73 (A8), Pace1224_45 (G2), Patbob_164 (FC), Phillis_70 (A8), Roary_74 (A8), Saintus_68 (A8), Smeadley_73 (A8), Stephig9_72 (A8), Yecey3_72 (A9),

Start 20:
• Found in 20 of 62 (32.3%) of genes in pham
• Manual Annotations of this start: 16 of 44
• Called 95.0% of time when present
• Phage (with cluster) where this start called: Auspice_53 (M1), Bongo_53 (M1), Bricole_53 (M1), Diminimus_54 (M1), Dulcita_54 (M1), FreakyGoo_54 (M1), Glaske16_54 (M1), IPhane7_53 (M1), Izel_54 (M1), KleverKiS_54 (M1), LilhomieP_52 (M1), Nanosmite_58 (M3), PegLeg_53 (M1), Reindeer_55 (M1), RoseMarie_59 (M1), Skinny_54 (M1), SlimJimmy_52 (M1), TpudiCK_55 (M1), TyDawg_53 (M1),

Start 21:
• Found in 1 of 62 (1.6%) of genes in pham
• No Manual Annotations of this start.
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Kinmap_70 (A21),

Start 22:

• Found in 5 of 62 (8.1%) of genes in pham
• Manual Annotations of this start: 3 of 44
• Called 80.0% of time when present
• Phage (with cluster) where this start called: Colin_66 (A2), Kalpine_67 (A2), Pharaoh_65 (A12), Trixie_66 (A2),

Start 23:
• Found in 3 of 62 (4.8%) of genes in pham
• No Manual Annotations of this start.
• Called 33.3% of time when present
• Phage (with cluster) where this start called: Greely_273 (C2),

Start 24:
• Found in 6 of 62 (9.7%) of genes in pham
• Manual Annotations of this start: 1 of 44
• Called 83.3% of time when present
• Phage (with cluster) where this start called: BooTeria_162 (FC), DunneganBoMo_153 (FC), Ellewin_159 (FC), Emmetator_156 (FC), KSunshine22_158 (FC),

Start 26:
• Found in 2 of 62 (3.2%) of genes in pham
• No Manual Annotations of this start.
• Called 50.0% of time when present
• Phage (with cluster) where this start called: WST1_48 (AJ),

Summary by clusters:

There are 14 clusters represented in this pham: A21, A22, G2, A12, CB, AJ, FC, M1, A6, M3, A8, A9, C2, A2,

Info for manual annotations of cluster A12:
•Start number 22 was manually annotated 1 time for cluster A12.

Info for manual annotations of cluster A2:
•Start number 22 was manually annotated 2 times for cluster A2.

Info for manual annotations of cluster A22:
•Start number 19 was manually annotated 1 time for cluster A22.

Info for manual annotations of cluster A6:
•Start number 17 was manually annotated 1 time for cluster A6.

Info for manual annotations of cluster A8:
•Start number 19 was manually annotated 11 times for cluster A8.

Info for manual annotations of cluster A9:
•Start number 18 was manually annotated 1 time for cluster A9.
•Start number 19 was manually annotated 1 time for cluster A9.

Info for manual annotations of cluster C2:

•Start number 11 was manually annotated 2 times for cluster C2.

Info for manual annotations of cluster CB:
•Start number 15 was manually annotated 2 times for cluster CB.

Info for manual annotations of cluster FC:
•Start number 12 was manually annotated 1 time for cluster FC.
•Start number 14 was manually annotated 1 time for cluster FC.
•Start number 19 was manually annotated 1 time for cluster FC.
•Start number 24 was manually annotated 1 time for cluster FC.

Info for manual annotations of cluster G2:
•Start number 16 was manually annotated 1 time for cluster G2.
•Start number 19 was manually annotated 1 time for cluster G2.

Info for manual annotations of cluster M1:
•Start number 20 was manually annotated 15 times for cluster M1.

Info for manual annotations of cluster M3:
•Start number 20 was manually annotated 1 time for cluster M3.

Gene Information:

Gene: Astro_73 Start: 40939, Stop: 40778, Start Num: 19
Candidate Starts for Astro_73:
(Start: 19 @40939 has 15 MA's), (43, 40855), (54, 40810), (57, 40798),

Gene: Atuin_156 Start: 110180, Stop: 110365, Start Num: 14
Candidate Starts for Atuin_156:
(Start: 14 @110180 has 1 MA's), (50, 110309), (52, 110315),

Gene: Auspice_53 Start: 38208, Stop: 38381, Start Num: 20
Candidate Starts for Auspice_53:
(Start: 20 @38208 has 16 MA's), (27, 38232), (40, 38280), (43, 38298),

Gene: Avocado_47 Start: 37189, Stop: 37362, Start Num: 19
Candidate Starts for Avocado_47:
(Start: 16 @37186 has 1 MA's), (Start: 19 @37189 has 15 MA's), (29, 37222), (31, 37231), (43, 37273), (51, 37309), (55, 37321), (56, 37327), (57, 37330),

Gene: Blinn1_71 Start: 39967, Stop: 39776, Start Num: 17
Candidate Starts for Blinn1_71:
(4, 40087), (Start: 17 @39967 has 1 MA's), (35, 39910), (39, 39892),

Gene: Bongo_53 Start: 38212, Stop: 38385, Start Num: 20
Candidate Starts for Bongo_53:
(Start: 20 @38212 has 16 MA's), (27, 38236), (40, 38284), (43, 38302),

Gene: BooTeria_162 Start: 107851, Stop: 108009, Start Num: 24
Candidate Starts for BooTeria_162:
(Start: 12 @107806 has 1 MA's), (Start: 24 @107851 has 1 MA's),

Gene: Bricole_53 Start: 38194, Stop: 38367, Start Num: 20
Candidate Starts for Bricole_53:
(Start: 20 @38194 has 16 MA's), (27, 38218), (40, 38266), (43, 38284),

Gene: Caitlin_71 Start: 40640, Stop: 40479, Start Num: 19
Candidate Starts for Caitlin_71:
(Start: 19 @40640 has 15 MA's), (43, 40556), (54, 40511), (57, 40499),

Gene: Cambiare_47 Start: 37281, Stop: 37448, Start Num: 16
Candidate Starts for Cambiare_47:
(Start: 16 @37281 has 1 MA's), (Start: 19 @37284 has 15 MA's), (29, 37317), (31, 37326), (51, 37404), (58, 37428),

Gene: Chargerpower_65 Start: 39591, Stop: 39409, Start Num: 19
Candidate Starts for Chargerpower_65:
(Start: 19 @39591 has 15 MA's), (29, 39561), (30, 39555),

Gene: Colin_66 Start: 42014, Stop: 41838, Start Num: 22
Candidate Starts for Colin_66:
(Start: 22 @42014 has 3 MA's), (29, 41987), (41, 41942), (52, 41897),

Gene: Danforth_73 Start: 40987, Stop: 40826, Start Num: 19
Candidate Starts for Danforth_73:
(Start: 19 @40987 has 15 MA's), (43, 40903), (54, 40858), (57, 40846),

Gene: Diminimus_54 Start: 38207, Stop: 38380, Start Num: 20
Candidate Starts for Diminimus_54:
(Start: 20 @38207 has 16 MA's), (27, 38231), (40, 38279), (43, 38297),

Gene: Dixon_72 Start: 40507, Stop: 40346, Start Num: 19
Candidate Starts for Dixon_72:
(Start: 19 @40507 has 15 MA's), (43, 40423), (54, 40378), (57, 40366),

Gene: Dulcita_54 Start: 38208, Stop: 38381, Start Num: 20
Candidate Starts for Dulcita_54:
(Start: 20 @38208 has 16 MA's), (27, 38232), (40, 38280), (43, 38298),

Gene: DunneganBoMo_153 Start: 107120, Stop: 107278, Start Num: 24
Candidate Starts for DunneganBoMo_153:
(Start: 12 @107075 has 1 MA's), (Start: 24 @107120 has 1 MA's),

Gene: Elephantoon_69 Start: 40932, Stop: 40738, Start Num: 18
Candidate Starts for Elephantoon_69:
(Start: 18 @40932 has 1 MA's), (28, 40902), (29, 40899),

Gene: Ellewin_159 Start: 107224, Stop: 107382, Start Num: 24
Candidate Starts for Ellewin_159:
(Start: 12 @107179 has 1 MA's), (Start: 24 @107224 has 1 MA's), (34, 107260),

Gene: Emmetator_156 Start: 107433, Stop: 107591, Start Num: 24
Candidate Starts for Emmetator_156:
(Start: 12 @107388 has 1 MA's), (Start: 24 @107433 has 1 MA's),

Gene: Expelliarmus_70 Start: 40711, Stop: 40550, Start Num: 19
Candidate Starts for Expelliarmus_70:
(Start: 19 @40711 has 15 MA's), (43, 40627), (54, 40582), (57, 40570),

Gene: FreakyGoo_54 Start: 38208, Stop: 38381, Start Num: 20
Candidate Starts for FreakyGoo_54:
(Start: 20 @38208 has 16 MA's), (27, 38232), (40, 38280), (43, 38298),

Gene: Glaske16_54 Start: 38207, Stop: 38380, Start Num: 20
Candidate Starts for Glaske16_54:
(Start: 20 @38207 has 16 MA's), (27, 38231), (40, 38279), (43, 38297),

Gene: GoldenEssence_151 Start: 104838, Stop: 104999, Start Num: 19
Candidate Starts for GoldenEssence_151:
(Start: 19 @104838 has 15 MA's), (29, 104871), (32, 104883), (37, 104892), (48, 104952), (52, 104964), (53, 104967), (54, 104970), (59, 104985),

Gene: Grayson_172 Start: 92452, Stop: 92664, Start Num: 15
Candidate Starts for Grayson_172:
(Start: 15 @92452 has 2 MA's),

Gene: Greely_273 Start: 162469, Stop: 162666, Start Num: 23
Candidate Starts for Greely_273:
(2, 162277), (6, 162340), (7, 162352), (9, 162394), (10, 162397), (Start: 11 @162415 has 2 MA's), (Start: 20 @162463 has 16 MA's), (23, 162469), (33, 162511), (36, 162523), (44, 162568), (53, 162604), (62, 162631), (65, 162646),

Gene: Groundhog_72 Start: 40917, Stop: 40756, Start Num: 19
Candidate Starts for Groundhog_72:
(Start: 19 @40917 has 15 MA's), (43, 40833), (54, 40788), (57, 40776),

Gene: IPhane7_53 Start: 38212, Stop: 38385, Start Num: 20
Candidate Starts for IPhane7_53:
(Start: 20 @38212 has 16 MA's), (27, 38236), (40, 38284), (43, 38302),

Gene: Izel_54 Start: 38207, Stop: 38380, Start Num: 20
Candidate Starts for Izel_54:
(Start: 20 @38207 has 16 MA's), (27, 38231), (40, 38279), (43, 38297),

Gene: KSunshine22_158 Start: 108183, Stop: 108341, Start Num: 24
Candidate Starts for KSunshine22_158:
(Start: 12 @108138 has 1 MA's), (Start: 24 @108183 has 1 MA's), (34, 108219),

Gene: Kalpine_67 Start: 42195, Stop: 42019, Start Num: 22
Candidate Starts for Kalpine_67:
(Start: 22 @42195 has 3 MA's), (41, 42123),

Gene: Kinmap_70 Start: 40504, Stop: 40307, Start Num: 21
Candidate Starts for Kinmap_70:
(8, 40609), (21, 40504), (25, 40489), (31, 40468), (35, 40453),

Gene: KleverKiS_54 Start: 38188, Stop: 38361, Start Num: 20

Candidate Starts for KleverKiS_54:
(Start: 20 @38188 has 16 MA's), (27, 38212), (40, 38260), (43, 38278),

Gene: LeoJr_166 Start: 110788, Stop: 110976, Start Num: 14
Candidate Starts for LeoJr_166:
(Start: 14 @110788 has 1 MA's), (Start: 22 @110809 has 3 MA's),

Gene: LilhomieP_52 Start: 38212, Stop: 38385, Start Num: 20
Candidate Starts for LilhomieP_52:
(Start: 20 @38212 has 16 MA's), (27, 38236), (40, 38284), (43, 38302),

Gene: Myrna_265 Start: 162813, Stop: 163058, Start Num: 11
Candidate Starts for Myrna_265:
(2, 162711), (7, 162771), (8, 162780), (10, 162795), (Start: 11 @162813 has 2 MA's), (23, 162864), (26, 162876), (55, 163005), (62, 163026),

Gene: Nanosmite_58 Start: 39866, Stop: 40042, Start Num: 20
Candidate Starts for Nanosmite_58:
(4, 39743), (Start: 20 @39866 has 16 MA's), (30, 39902), (43, 39959), (52, 39998),

Gene: NearlyHeadless_73 Start: 40753, Stop: 40592, Start Num: 19
Candidate Starts for NearlyHeadless_73:
(Start: 19 @40753 has 15 MA's), (43, 40669), (54, 40624), (57, 40612),

Gene: Pace1224_45 Start: 36103, Stop: 36276, Start Num: 19
Candidate Starts for Pace1224_45:
(Start: 19 @36103 has 15 MA's), (29, 36136), (51, 36223), (55, 36235), (56, 36241), (57, 36244),

Gene: Panchaali_165 Start: 107904, Stop: 108107, Start Num: 12
Candidate Starts for Panchaali_165:
(Start: 12 @107904 has 1 MA's), (43, 108018), (61, 108084),

Gene: Patbob_164 Start: 111552, Stop: 111728, Start Num: 19
Candidate Starts for Patbob_164:
(Start: 19 @111552 has 15 MA's), (63, 111717),

Gene: PegLeg_53 Start: 38211, Stop: 38384, Start Num: 20
Candidate Starts for PegLeg_53:
(Start: 20 @38211 has 16 MA's), (27, 38235), (40, 38283), (43, 38301),

Gene: Peregrin_170 Start: 91883, Stop: 92095, Start Num: 15
Candidate Starts for Peregrin_170:
(Start: 15 @91883 has 2 MA's),

Gene: Phabba_275 Start: 161775, Stop: 162020, Start Num: 11
Candidate Starts for Phabba_275:
(1, 161574), (2, 161637), (6, 161700), (7, 161712), (8, 161721), (9, 161754), (10, 161757), (Start: 11 @161775 has 2 MA's), (23, 161829), (28, 161850), (33, 161871), (47, 161943), (51, 161955), (62, 161988), (64, 162000), (65, 162003),

Gene: Pharaoh_65 Start: 41502, Stop: 41326, Start Num: 22
Candidate Starts for Pharaoh_65:
(Start: 22 @41502 has 3 MA's), (29, 41475),

Gene: Phillis_70 Start: 40207, Stop: 40049, Start Num: 19
Candidate Starts for Phillis_70:
(3, 40354), (5, 40321), (Start: 19 @40207 has 15 MA's), (51, 40087), (57, 40066), (58, 40063), (60, 40060),

Gene: ReginaGlobina_169 Start: 112062, Stop: 112247, Start Num: 14
Candidate Starts for ReginaGlobina_169:
(Start: 14 @112062 has 1 MA's), (50, 112191), (52, 112197),

Gene: Reindeer_55 Start: 39414, Stop: 39587, Start Num: 20
Candidate Starts for Reindeer_55:
(4, 39291), (Start: 20 @39414 has 16 MA's), (42, 39501), (43, 39504),

Gene: Roary_74 Start: 40972, Stop: 40811, Start Num: 19
Candidate Starts for Roary_74:
(Start: 19 @40972 has 15 MA's), (43, 40888), (45, 40876), (54, 40843), (57, 40831),

Gene: RoseMarie_59 Start: 41858, Stop: 42031, Start Num: 20
Candidate Starts for RoseMarie_59:
(Start: 20 @41858 has 16 MA's), (27, 41882), (38, 41924), (43, 41948), (46, 41963), (51, 41984),

Gene: Saintus_68 Start: 37637, Stop: 37476, Start Num: 19
Candidate Starts for Saintus_68:
(Start: 19 @37637 has 15 MA's), (43, 37553), (54, 37508), (57, 37496),

Gene: Skinny_54 Start: 38641, Stop: 38814, Start Num: 20
Candidate Starts for Skinny_54:
(Start: 20 @38641 has 16 MA's), (27, 38665), (40, 38713), (43, 38731),

Gene: SlimJimmy_52 Start: 38195, Stop: 38368, Start Num: 20
Candidate Starts for SlimJimmy_52:
(Start: 20 @38195 has 16 MA's), (27, 38219), (40, 38267), (43, 38285),

Gene: Smeadley_73 Start: 40833, Stop: 40672, Start Num: 19
Candidate Starts for Smeadley_73:
(Start: 19 @40833 has 15 MA's), (43, 40749), (54, 40704), (57, 40692),

Gene: Stephig9_72 Start: 40770, Stop: 40612, Start Num: 19
Candidate Starts for Stephig9_72:
(Start: 19 @40770 has 15 MA's), (31, 40728), (43, 40686), (54, 40641), (57, 40629), (58, 40626),

Gene: Stewart25555_153 Start: 108142, Stop: 108345, Start Num: 12
Candidate Starts for Stewart25555_153:
(Start: 12 @108142 has 1 MA's), (60, 108319),

Gene: TpudiCK_55 Start: 38211, Stop: 38384, Start Num: 20
Candidate Starts for TpudiCK_55:
(Start: 20 @38211 has 16 MA's), (27, 38235), (40, 38283), (43, 38301),

Gene: Trixie_66 Start: 41830, Stop: 41654, Start Num: 22
Candidate Starts for Trixie_66:
(Start: 22 @41830 has 3 MA's), (41, 41758), (52, 41713),

Gene: TyDawg_53 Start: 38212, Stop: 38385, Start Num: 20
Candidate Starts for TyDawg_53:
(Start: 20 @38212 has 16 MA's), (27, 38236), (40, 38284), (43, 38302),

Gene: WST1_48 Start: 30928, Stop: 31071, Start Num: 26
Candidate Starts for WST1_48:
(13, 30883), (26, 30928), (29, 30940), (31, 30949), (32, 30952), (49, 31021), (55, 31039), (58, 31051),

Gene: WaddleDee_149 Start: 106261, Stop: 106464, Start Num: 12
Candidate Starts for WaddleDee_149:
(Start: 12 @106261 has 1 MA's), (Start: 24 @106306 has 1 MA's),

Gene: Yecey3_72 Start: 41315, Stop: 41127, Start Num: 19
Candidate Starts for Yecey3_72:
(Start: 19 @41315 has 15 MA's), (29, 41282),