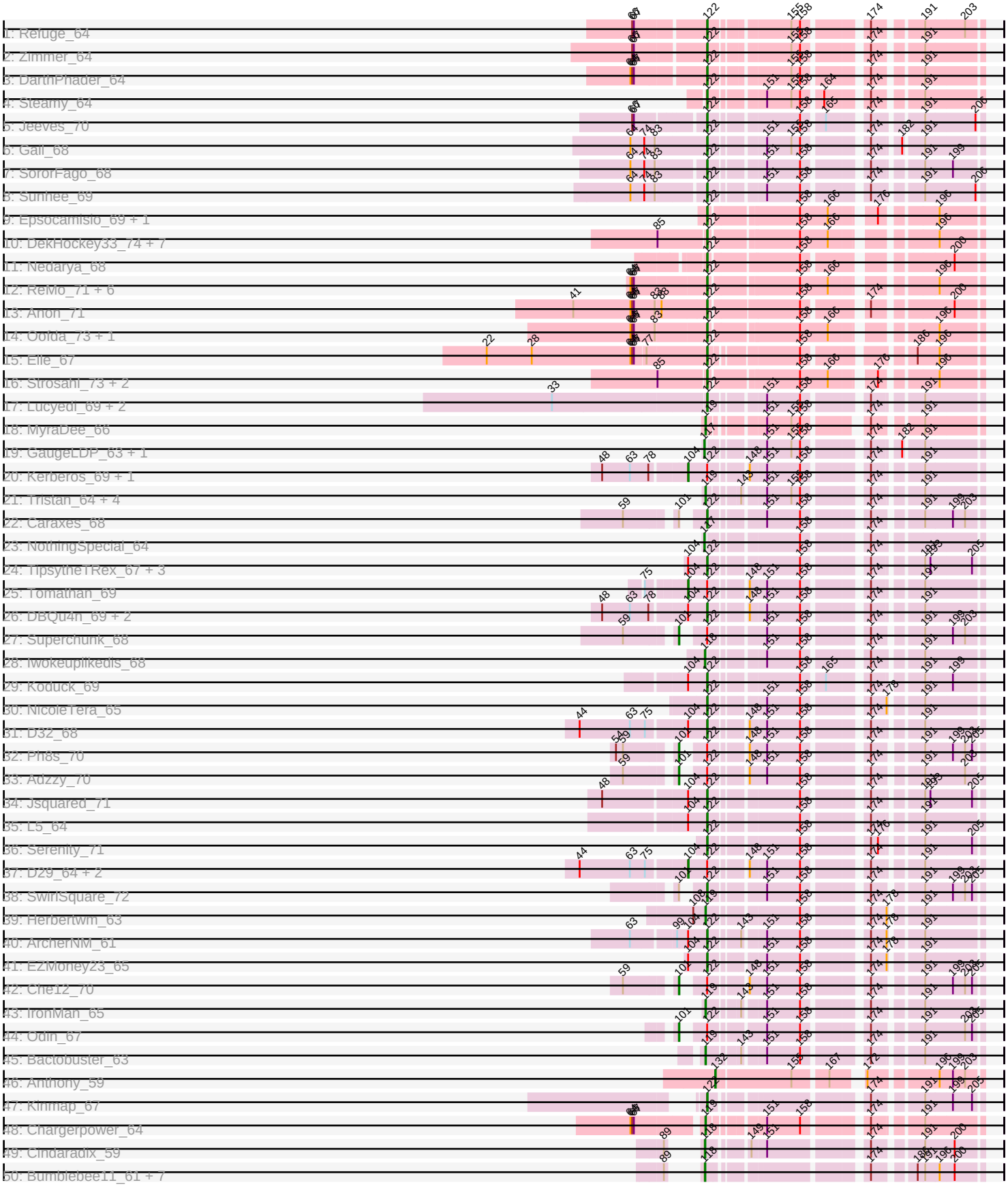
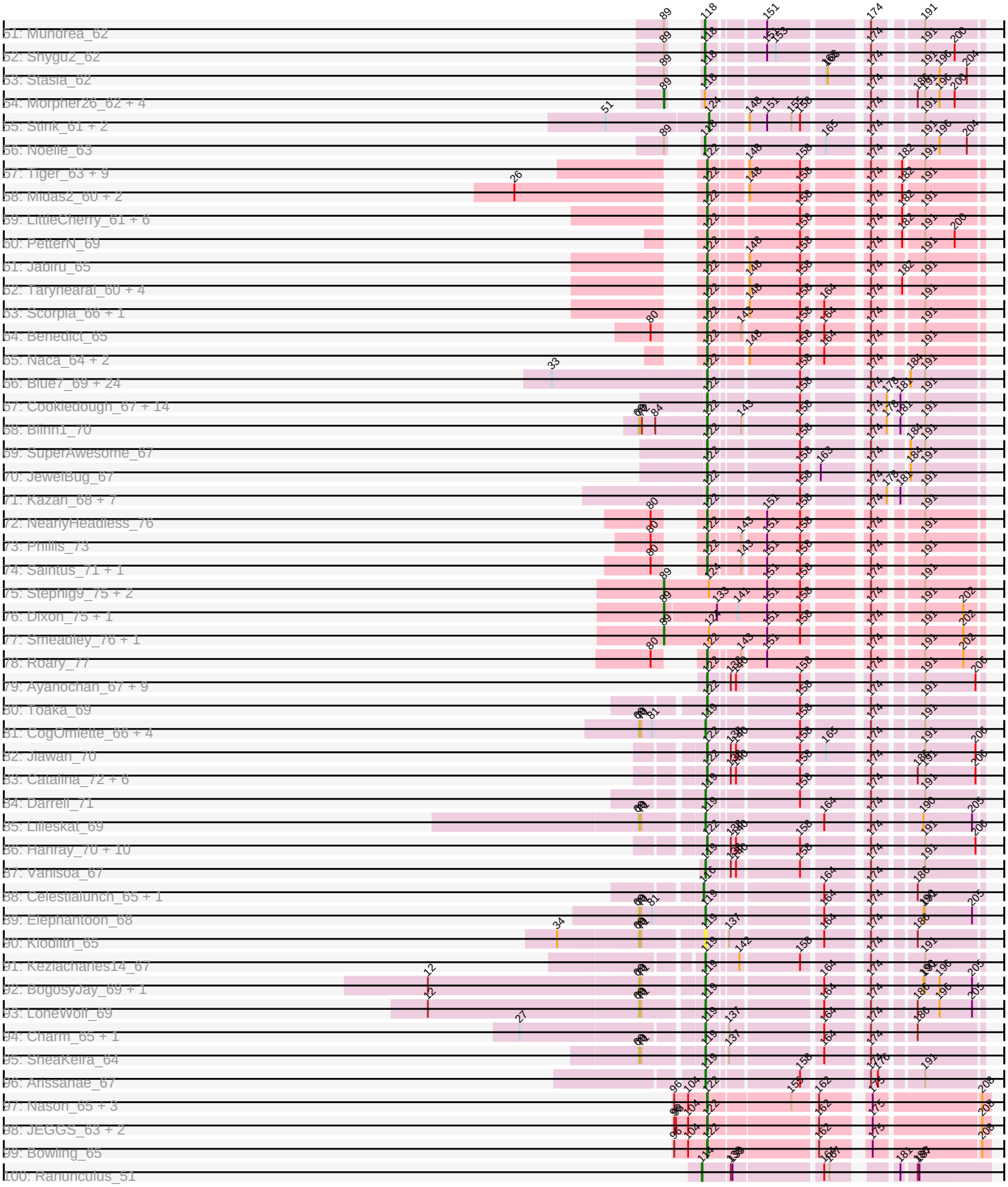
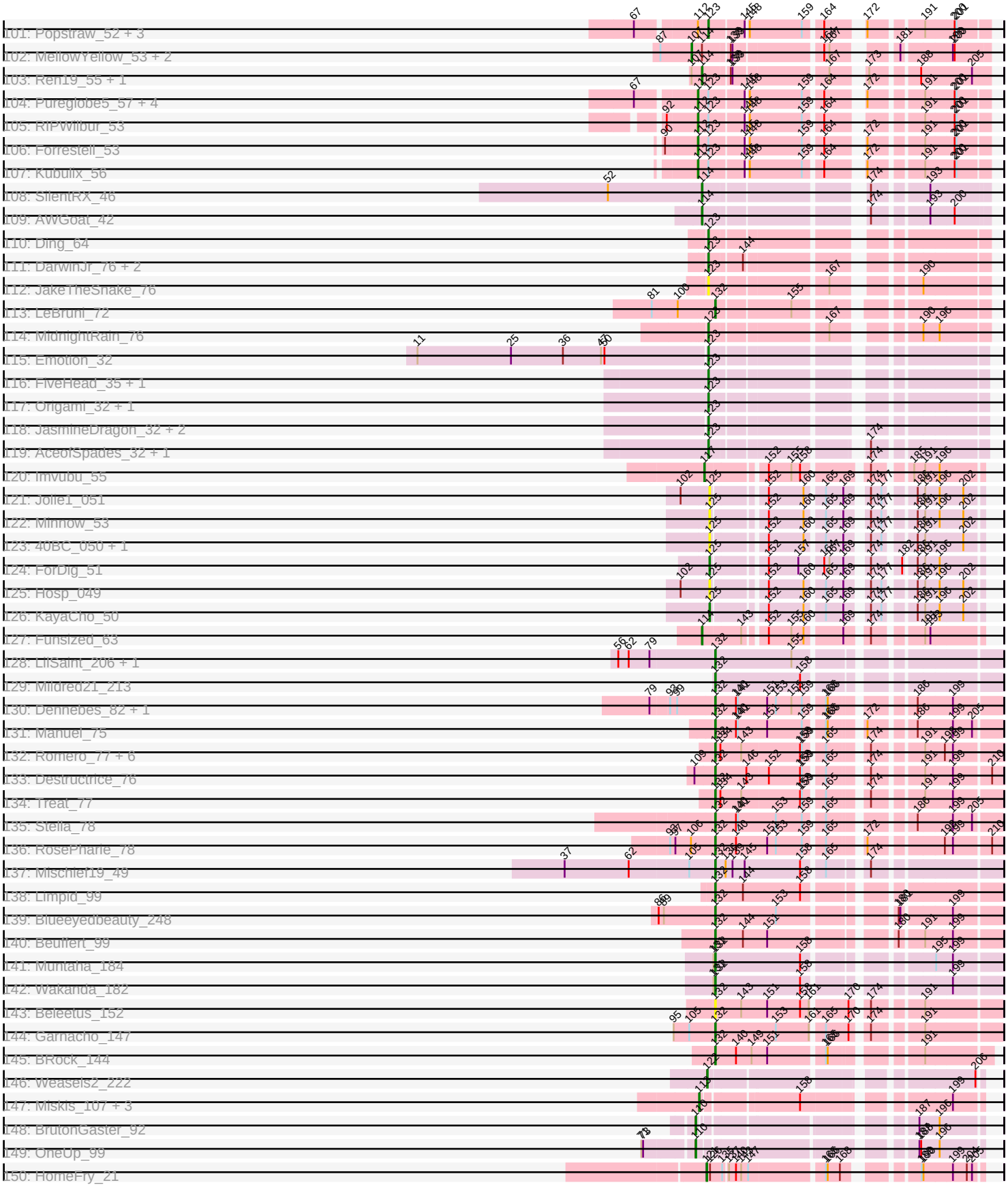
Pham 343480


1: Refuge_64
2: Zimmer_64
3: DarthPhader_64
4: Steamy_64
5: Jeeves_70
6: Gail_68
7: SororFago_68
8: Sunhee_69
9: Epsocamisio_69 + 1
10: DekHockey33_74 + 7
11: Nedarya_68
12: ReMo_71 + 6
13: Anon_71
14: Oolda_73 + 1
15: Elle_67
16: Strosani_73 + 2
17: Lucyedi_69 + 2
18: MyraDee_66
19: GaugeLDP_63 + 1
20: Kerberos_69 + 1
21: Tristan_64 + 4
22: Caraxes_68
23: NothingSpecial_64
24: TipsytheTRex_67 + 3
25: Tomathan_69
26: DBQu4n_69 + 2
27: Superchunk_68
28: Iwokeuplikedis_68
29: Kodiuck_69
30: NicoleTera_65
31: D32_68
32: Phi8s_70
33: Adzzy_70
34: Jsquared_71
35: L5_64
36: Serenity_71
37: D29_64 + 2
38: SwimSquare_72
39: Herbertwm_63
40: ArcherNM_61
41: EZMoney23_65
42: Che12_70
43: IronMan_65
44: Odin_67
45: Bactobuster_63
46: Anthony_59
47: Kinmap_67
48: Chargerpower_64
49: Cindaradix_59
50: Bumblebee11_61 + 7

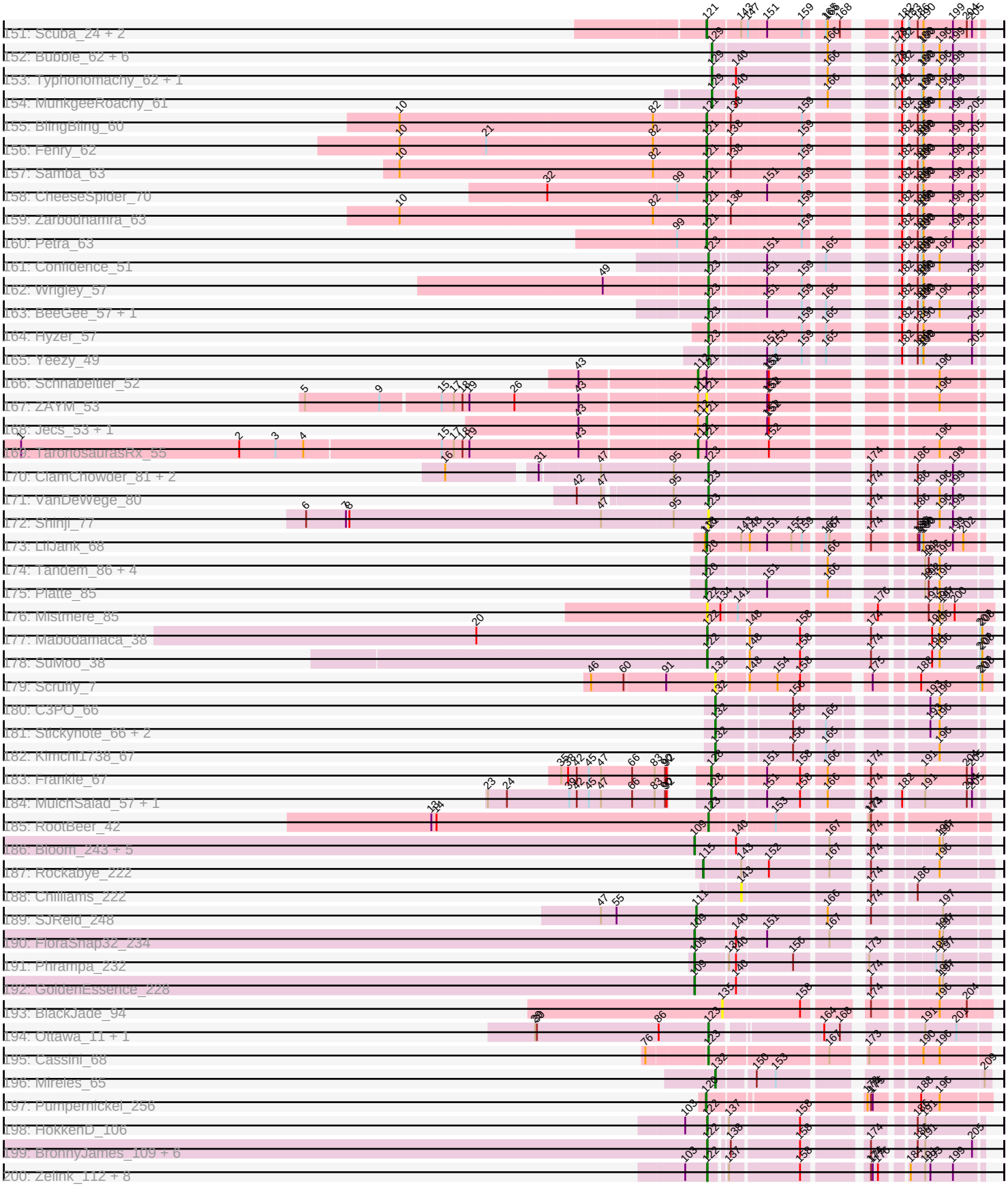
Pham 343480


51: Mundrea_62
52: Shygu2_62
53: Stasia_62
54: Morpher26_62 + 4
55: Stink_61 + 2
56: Noelle_63
57: Tiger_63 + 9
58: Midas2_60 + 2
59: LittleCherry_61 + 6
60: PetterN_69
61: Jabiru_65
62: Tarynearal_60 + 4
63: Scorpia_66 + 1
64: Benedict_65
65: Naca_64 + 2
66: Blue7_69 + 24
67: Cookiedough_67 + 14
68: Blinn1_70
69: SuperAwesome_67
70: JewelBug_67
71: Kazan_68 + 7
72: NearlyHeadless_76
73: Phillis_73
74: Saintus_71 + 1
75: Stephig9_75 + 2
76: Dixon_75 + 1
77: Smeadley_76 + 1
78: Roary_77
79: Ayanochan_67 + 9
80: Toaka_69
81: CogOmlette_66 + 4
82: Jiawan_70
83: Catalina_72 + 6
84: Darrell_71
85: Lilleskat_69
86: Hanray_70 + 10
87: Vanisoa_67
88: Celestialunch_65 + 1
89: Elephantoon_68
90: Klodilth_65
91: Keziacharles14_67
92: BogosyJay_69 + 1
93: LoneWolf_69
94: Charm_65 + 1
95: SneaKeira_64
96: Arissanae_67
97: Nason_65 + 3
98: JEGGS_63 + 2
99: Bowling_65
100: Ranunculus_51

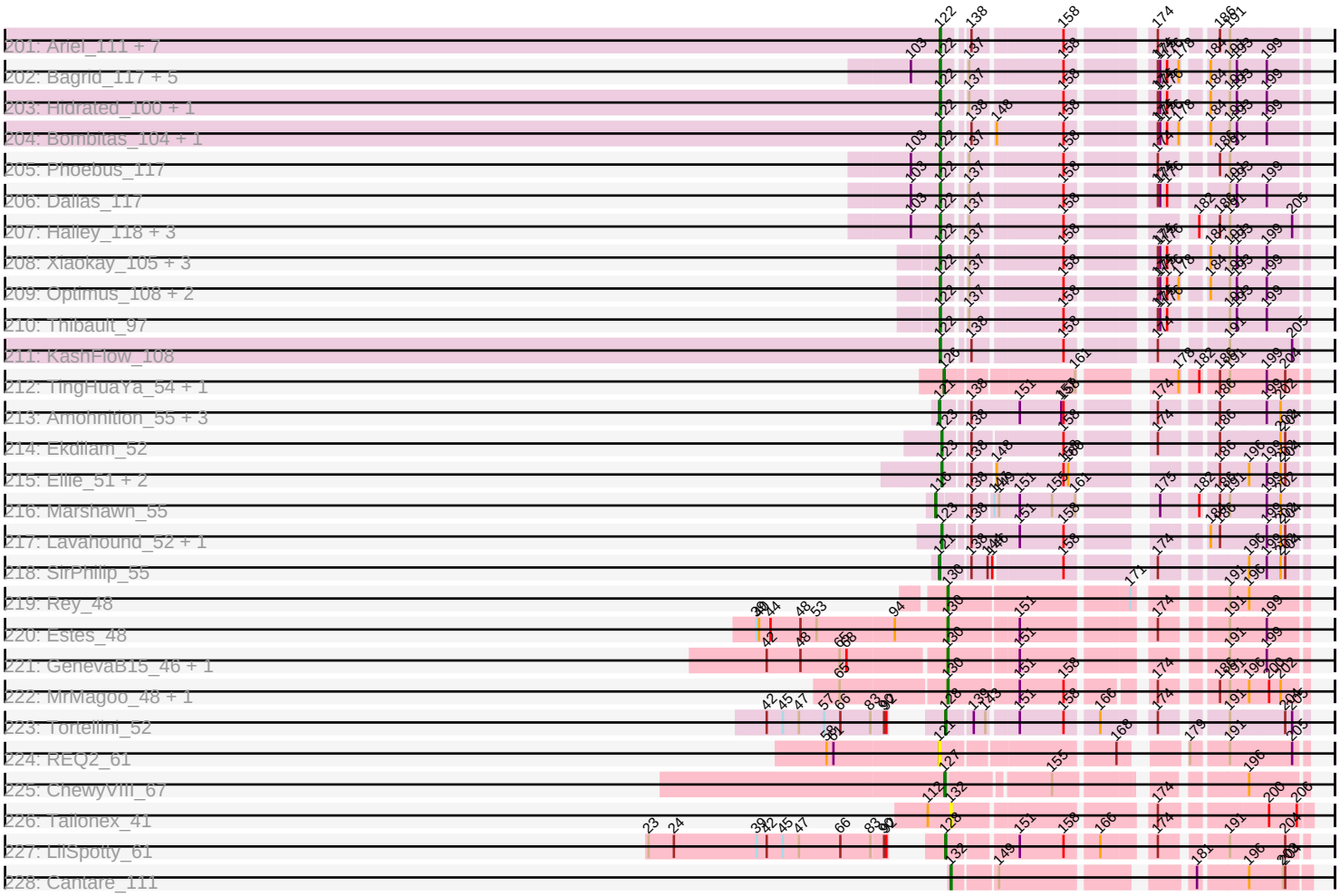
Pham 343480


101: Popstraw_52 + 3
102: MellowYellow_53 + 2
103: Ren19_55 + 1
104: Pureglobe5_57 + 4
105: RIPWilbur_53
106: Forrestell_53
107: Kubulix_56
108: SilentRX_46
109: AWGoat_42
110: Ding_64
111: DarwinJr_76 + 2
112: JakeTheSnake_76
113: LeBruni_72
114: MidnightRain_76
115: Emotion_32
116: FiveHead_35 + 1
117: Origami_32 + 1
118: JasmineDragon_32 + 2
119: AceofSpades_32 + 1
120: Imvubu_55
121: Jolie1_051
122: Minnow_53
123: 40BC_050 + 1
124: ForDig_51
125: Hosp_049
126: KayaCho_50
127: Funsized_63
128: LilSaint_206 + 1
129: Mildred21_213
130: Dennebes_82 + 1
131: Manuel_75
132: Romero_77 + 6
133: Destructrice_76
134: Treat_77
135: Stella_78
136: RosePharie_78
137: Mischief19_49
138: Limpid_99
139: Blueeyedbeauty_248
140: Beuffert_99
141: Montana_184
142: Wakanda_182
143: Beleetus_152
144: Garnacho_147
145: BRock_144
146: Weasels2_222
147: Miskis_107 + 3
148: BrutonGaster_92
149: OneUp_99
150: HomeFry_21

Pham 343480


151: Scuba_24 + 2
152: Bubble_62 + 6
153: Typhonomachy_62 + 1
154: MunkgeeRoachy_61
155: BlingBling_60
156: Fenry_62
157: Samba_63
158: CheeseSpider_70
159: Zarboonamra_63
160: Petra_63
161: Confidence_51
162: Wrigley_57
163: BeeGee_57 + 1
164: Ryzer_57
165: Yeezy_49
166: Schnabeltier_52
167: ZAYM_53
168: Jecs_53 + 1
169: TarohiosaurasRex_55
170: ClamChowder_81 + 2
171: VanDeWege_80
172: Shinji_77
173: LilJank_68
174: Tandem_86 + 4
175: Platte_85
176: Mistmere_85
177: Mabodamaca_38
178: SuMoo_38
179: Scruffy_7
180: C3PO_66
181: Stickynote_66 + 2
182: Kimchi1738_67
183: Frankie_67
184: MulchSalad_57 + 1
185: RootBeer_42
186: Bloom_243 + 5
187: Rockabye_222
188: Chilliams_222
189: SJReid_248
190: FloraSnap32_234
191: Phrampa_232
192: GoldenEssence_228
193: BlackJade_94
194: Ottawa_11 + 1
195: Cassini_68
196: Mireles_65
197: Pumpernickel_256
198: HokkenD_106
199: BronnyJames_109 + 6
200: Zelink_112 + 8

Pham 343480


201: Ariel_111 + 7
202: Bagrid_117 + 5
203: Hidrated_100 + 1
204: Bombitas_104 + 1
205: Phoebus_117
206: Dallas_117
207: Halley_118 + 3
208: Xiaokay_105 + 3
209: Optimus_108 + 2
210: Thibault_97
211: KashFlow_108
212: YingHuaYa_54 + 1
213: Ammunition_55 + 3
214: Ekuliam_52
215: Ellie_51 + 2
216: Marshawn_55
217: Lavahound_52 + 1
218: SirPhillip_55
219: Rey_48
220: Estes_48
221: GenevaB15_46 + 1
222: MrMagoo_48 + 1
223: Tortellini_52
224: REQ2_61
225: ChewyVIII_67
226: Tallonex_41
227: LilSpotty_61
228: Cantare_111

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 343480 Report

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

Pham number 343480 has 484 members, 49 are drafts.

Phages represented in each track:
- Track 1 : Refuge_64
- Track 2 : Zimmer_64
- Track 3 : DarthPhader_64
- Track 4 : Steamy_64
- Track 5 : Jeeves_70
- Track 6 : Gail_68
- Track 7 : SororFago_68
- Track 8 : Sunhee_69
- Track 9 : Epsocamisio_69, Nebulosus_70
- Track 10 : DekHockey33_74, Rosalind_71, Battleship_75, JSwag_72, MinecraftSteve_73, Switzerland_72, KatherineG_73, ShayRa_73
- Track 11 : Nedarya_68
- Track 12 : ReMo_71, Ravana_74, Anaysia_73, Boohoo_73, Looper_72, Soups_73, LastResort_71
- Track 13 : Anon_71
- Track 14 : Oofda_73, Warrior24_74
- Track 15 : Elle_67
- Track 16 : Strosahl_73, Waits_73, Remus_73
- Track 17 : Lucyedi_69, EagleEye_70, PainterBoy_68
- Track 18 : MyraDee_66
- Track 19 : GaugeLDP_63, BabyBack_64
- Track 20 : Kerberos_69, Duplo_69
- Track 21 : Tristan_64, Pukovnik_64, Phaded_64, Jaan_66, Landor_66
- Track 22 : Caraxes_68
- Track 23 : NothingSpecial_64
- Track 24 : TipsytheTRex_67, Quokka_69, Bradman_70, MajorMajor_69
- Track 25 : Tomathan_69
- Track 26 : DBQu4n_69, StarStuff_69, Pomar16_68
- Track 27 : Superchunk_68
- Track 28 : Iwokeuplikedis_68
- Track 29 : Koduck_69
- Track 30 : NicoleTera_65
- Track 31 : D32_68
- Track 32 : Ph8s_70
- Track 33 : Adzzy_70
- Track 34 : Jsquared_71
- Track 35 : L5_64

• Track 36 : Serenity_71
• Track 37 : D29_64, Travvers_68, Naji_69
• Track 38 : SwirlSquare_72
• Track 39 : Herbertwm_63
• Track 40 : ArcherNM_61
• Track 41 : EZMoney23_65
• Track 42 : Che12_70
• Track 43 : IronMan_65
• Track 44 : Odin_67
• Track 45 : Bactobuster_63
• Track 46 : Anthony_59
• Track 47 : Kinmap_67
• Track 48 : Chargerpower_64
• Track 49 : Cindaradix_59
• Track 50 : Bumblebee11_61, AbbysRanger_62, Backyardigan_60, PetiteSangsue_62, Katalie136_62, Cici_62, Datway_62, Achebe_61
• Track 51 : Mundrea_62
• Track 52 : Shygu2_62
• Track 53 : Stasia_62
• Track 54 : Morpher26_62, Xena_61, Wile_62, Perplexer_62, Badger_61
• Track 55 : Stink_61, Miramae_61, AvatarAhPeg_61
• Track 56 : Noelle_63
• Track 57 : Tiger_63, AgentM_63, Phlorence_62, PickleBack_64, Jovo_64, Lev2_64, Aragog_63, ForGetIt_64, Conspiracy_64, Discoknowium_61
• Track 58 : Midas2_60, Cuco_62, Coog_60
• Track 59 : LittleCherry_61, Bonamassa_61, Swirley_63, Twigg_61, George_58, HuhtaEnerson15_61, Milcery_61
• Track 60 : PetterN_69
• Track 61 : Jabiru_65
• Track 62 : Tarynearal_60, Florence4_60, UnionJack_65, Prinashe11_61, Florence1_58
• Track 63 : Scorpia_66, Chadwick_66
• Track 64 : Benedict_65
• Track 65 : Naca_64, Airmid_64, ElTiger69_66
• Track 66 : Blue7_69, Jeffabunny_68, Temprado_69, Artemis2UCLA_68, BennyP_68, WunderPhul_68, CloudWang3_69, Gladiator_65, Hexamo_68, Hammer_68, Wiks_67, Helmet_70, Rifter_68, Tucker_68, Lilbunny_67, Zaka_68, Koko_70, Yokurt_67, Gruunaga_68, BlessJoy_68, ToneTone_65, Garak_69, Zulu_69, Indra_71, Roksolana_69
• Track 67 : Cookiedough_67, Polyphemus_69, Priamo_69, Pmask_66, Imbriano_69, Neeharika16_66, Isiphiwo_65, Newrala_67, Dorothea_67, Chartreuse_66, DaVinci_65, Jordennis_66, DelvinSonDorr_64, McFly_67, SuperCallie99_64
• Track 68 : Blinn1_70
• Track 69 : SuperAwesome_67
• Track 70 : JewelBug_67
• Track 71 : Kazan_68, Candra_68, EricB_66, BABullseye_60, Hoot_62, VohminGhazi_67, SmellyB_67, Kipper29_67
• Track 72 : NearlyHeadless_76
• Track 73 : Phillis_73
• Track 74 : Saintus_71, Danforth_76
• Track 75 : Stephig9_75, Groundhog_75, Astro_76
• Track 76 : Dixon_75, Caitlin_75
• Track 77 : Smeadley_76, Expelliarmus_73

• Track 78 : Roary_77
• Track 79 : Ayanochan_67, ExplosioNervosa_68, Alma_68, Spouty_68, Priya_68, EmyBug_67, Eidsmoe_68, Fayely_68, Qobbit_68, Conquerage_68
• Track 80 : Toaka_69
• Track 81 : CogOmlette_66, Bellris_68, WorldCup_66, Minispark_66, Rahalelujah_68
• Track 82 : Jiawan_70
• Track 83 : Catalina_72, Aliter_71, HortumSL17_71, Tubs_70, PackMan_69, Myxus_70, Phaeder_70
• Track 84 : Darrell_71
• Track 85 : Lilleskat_69
• Track 86 : Hanray_70, Beemo_70, RyeScarlet_70, EdogawaKiddo_70, Onglai_69, Ugenie5_65, Phonnegut_70, Scherzo_69, Holex_70, Sachima_70, Pioneer_70
• Track 87 : Vanisoa_67
• Track 88 : Celestialunch_65, MegTheThird_65
• Track 89 : Elephantoon_68
• Track 90 : Klodlith_65
• Track 91 : Keziacharles14_67
• Track 92 : BogosyJay_69, Maminiaina_69
• Track 93 : LoneWolf_69
• Track 94 : Charm_65, DreamTeam1_65
• Track 95 : SheaKeira_64
• Track 96 : Arissanae_67
• Track 97 : Nason_65, Elsa_65, Xenomorph_61, Arcadia_65
• Track 98 : JEGGS_63, Heisenberger_63, Mudcat_61
• Track 99 : Bowling_65
• Track 100 : Ranunculus_51
• Track 101 : Popstraw_52, PhuzzTulsa_53, BetaFish_56, Hive_53
• Track 102 : MellowYellow_53, RazzB_52, NyleyClemson_51
• Track 103 : Ren19_55, Nikan_57
• Track 104 : Pureglobe5_57, Pointis_54, DogYard_55, Odyssey395_58, Beagle_56
• Track 105 : RIPWilbur_53
• Track 106 : Forrestell_53
• Track 107 : Kubulix_56
• Track 108 : SilentRX_46
• Track 109 : AWGoat_42
• Track 110 : Ding_64
• Track 111 : DarwinJr_76, Crescenzo_74, Nyilah_74
• Track 112 : JakeTheSnake_76
• Track 113 : LeBruni_72
• Track 114 : MidnightRain_76
• Track 115 : Emotion_32
• Track 116 : FiveHead_35, JohnThicc_32
• Track 117 : Origami_32, LadyAstra_32
• Track 118 : JasmineDragon_32, ShakeItOph_32, MiniMommy_32
• Track 119 : AceofSpades_32, VroomVroom_32
• Track 120 : Imvubu_55
• Track 121 : Jolie1_051
• Track 122 : Minnow_53
• Track 123 : 40BC_050, 39HC_050
• Track 124 : ForDig_51
• Track 125 : Hosp_049
• Track 126 : KayaCho_50
• Track 127 : Funsized_63

• Track 128 : LilSaint_206, Anedea_218
• Track 129 : Mildred21_213
• Track 130 : Dennebes_82, Rideau_81
• Track 131 : Manuel_75
• Track 132 : Romero_77, JPandJE_76, Percastrophe_77, HaugeAnator_77, ZooBear_77, Olicious_77, ToriToki_77
• Track 133 : Destructrice_76
• Track 134 : Treat_77
• Track 135 : Stella_78
• Track 136 : RosePharie_78
• Track 137 : Mischief19_49
• Track 138 : Limpid_99
• Track 139 : Blueeyedbeauty_248
• Track 140 : Beuffert_99
• Track 141 : Muntaha_184
• Track 142 : Wakanda_182
• Track 143 : Beleetus_152
• Track 144 : Garnacho_147
• Track 145 : BRock_144
• Track 146 : Weasels2_222
• Track 147 : Miskis_107, Norvs_114, Aphelion_113, Toniann_112
• Track 148 : BrutonGaster_92
• Track 149 : OneUp_99
• Track 150 : HomeFry_21
• Track 151 : Scuba_24, Fury_24, Pleakley_24
• Track 152 : Bubble_62, Starburst_63, Cozz_62, GoldHunter_63, Axym_62, RADical_64, Agatha_63
• Track 153 : Typhonomachy_62, Socotra_64
• Track 154 : MunkgeeRoachy_61
• Track 155 : BlingBling_60
• Track 156 : Fenry_62
• Track 157 : Samba_63
• Track 158 : CheeseSpider_70
• Track 159 : Zarbodnamra_63
• Track 160 : Petra_63
• Track 161 : Confidence_51
• Track 162 : Wrigley_57
• Track 163 : BeeGee_57, LonelyBoi_50
• Track 164 : Hyzer_57
• Track 165 : Yeezy_49
• Track 166 : Schnabeltier_52
• Track 167 : ZAYM_53
• Track 168 : Jecs_53, Opie_54
• Track 169 : TaronosaurasRx_55
• Track 170 : ClamChowder_81, Fugax_82, Barb_81
• Track 171 : VanDeWege_80
• Track 172 : Shinji_77
• Track 173 : LilJank_68
• Track 174 : Tandem_86, Hortus1_86, Alleb_84, Pioneer3_86, OlinDD_86
• Track 175 : Platte_85
• Track 176 : Mistmere_85
• Track 177 : Mabodamaca_38
• Track 178 : SuMoo_38

• Track 179 : Scruffy_7
• Track 180 : C3PO_66
• Track 181 : Stickynote_66, Cruella_66, Darwin_67
• Track 182 : Kimchi1738_67
• Track 183 : Frankie_67
• Track 184 : MulchSalad_57, Cubone_47
• Track 185 : RootBeer_42
• Track 186 : Bloom_243, Mimi_239, Talia1610_241, Patbob_237, Racecar_241, FrostedClock_241
• Track 187 : Rockabye_222
• Track 188 : Chilliams_222
• Track 189 : SJReid_248
• Track 190 : FloraSnap32_234
• Track 191 : Phrampa_232
• Track 192 : GoldenEssence_228
• Track 193 : BlackJade_94
• Track 194 : Ottawa_11, Kharcho_11
• Track 195 : Cassini_68
• Track 196 : Mireles_65
• Track 197 : Pumpernickel_256
• Track 198 : HokkenD_106
• Track 199 : BronnyJames_109, Nibley_104, Lucky2013_108, Shaboozey_109, Gonephishing_105, LittleE_115, Hannaconda_102
• Track 200 : Zelink_112, Duke13_112, JuicyJay_113, Beem_118, Marleymoo_100, NihilNomen_118, Kalah2_109, ThreeRngTarjay_113, Dove_102
• Track 201 : Ariel_111, Porcelain_111, Rearden_105, Omega_120, Courthouse_106, Squint_109, MiaZeal_111, Superphikiman_108
• Track 202 : Bagrid_117, Schatzie_111, EricMillard_109, BAKA_117, Odette_118, DmpstrDiver_117
• Track 203 : Hidrated_100, Bobby_110
• Track 204 : Bombitas_104, Yeet_107
• Track 205 : Phoebus_117
• Track 206 : Dallas_117
• Track 207 : Halley_118, Redno2_108, Hughesyang_115, Ejimix_110
• Track 208 : Xiaokay_105, Klein_114, Wanda_117, Constella_99
• Track 209 : Optimus_108, Minerva_114, Pound_106
• Track 210 : Thibault_97
• Track 211 : KashFlow_108
• Track 212 : TingHuaYa_54, LastHope_56
• Track 213 : Amohnition_55, DarthP_55, Hammy_55, November_53
• Track 214 : Ekdilam_52
• Track 215 : Ellie_51, Applecrisp_52, Fefferhead_53
• Track 216 : Marshawn_55
• Track 217 : Lavahound_52, Amgine_53
• Track 218 : SirPhilip_55
• Track 219 : Rey_48
• Track 220 : Estes_48
• Track 221 : GenevaB15_46, Aziz_46
• Track 222 : MrMagoo_48, GardenSalsa_48
• Track 223 : Tortellini_52
• Track 224 : REQ2_61
• Track 225 : ChewyVIII_67
• Track 226 : Tailonex_41

• Track 227 : LilSpotty_61
• Track 228 : Cantare_111

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

The start number called the most often in the published annotations is 122, it was called in 218 of the 435 non-draft genes in the pham.

Genes that call this "Most Annotated" start:
• AgentM_63, Airmid_64, Aliter_71, Alma_68, Anaysia_73, Anon_71, Aragog_63, Arcadia_65, ArcherNM_61, Ariel_111, Artemis2UCLA_68, Ayanochan_67, BABullseye_60, BAKA_117, Bagrid_117, Battleship_75, Beem_118, Beemo_70, Benedict_65, BennyP_68, BlessJoy_68, Blinn1_70, Blue7_69, Bobby_110, Bombitas_104, Bonamassa_61, Boohoo_73, Bowling_65, Bradman_70, BronnyJames_109, Candra_68, Caraxes_68, Catalina_72, Chadwick_66, Chartreuse_66, CloudWang3_69, Conquerage_68, Conspiracy_64, Constella_99, Coog_60, Cookiedough_67, Courthouse_106, Cuco_62, D32_68, DBQu4n_69, DaVinci_65, Dallas_117, Danforth_76, DarthPhader_64, DekHockey33_74, DelvinSonDorr_64, Discoknowium_61, DmpstrDiver_117, Dorothea_67, Dove_102, Duke13_112, EZMoney23_65, EagleEye_70, EdogawaKiddo_70, Eidsmoe_68, Ejimix_110, ElTiger69_66, Elle_67, Elsa_65, EmyBug_67, Epsocamisio_69, EricB_66, EricMillard_109, ExplosioNervosa_68, Fayely_68, Florence1_58, Florence4_60, ForGetIt_64, Gail_68, Garak_69, George_58, Gladiator_65, Gonephishing_105, Gruunaga_68, Halley_118, Hammer_68, Hannaconda_102, Hanray_70, Heisenberger_63, Helmet_70, Hexamo_68, Hidrated_100, HokkenD_106, Holex_70, Hoot_62, HortumSL17_71, Hughesyang_115, HuhtaEnerson15_61, Imbriano_69, Indra_71, Isiphiwo_65, JEGGS_63, JSwag_72, Jabiru_65, Jeeves_70, Jeffabunny_68, JewelBug_67, Jiawan_70, Jordennis_66, Jovo_64, Jsquared_71, JuicyJay_113, Kalah2_109, KashFlow_108, KatherineG_73, Kazan_68, Kinmap_67, Kipper29_67, Klein_114, Koduck_69, Koko_70, L5_64, LastResort_71, Lev2_64, Lilbunny_67, LittleCherry_61, LittleE_115, Looper_72, Lucky2013_108, Lucyedi_69, Mabodamaca_38, MajorMajor_69, Marleymoo_100, McFly_67, MiaZeal_111, Midas2_60, Milcery_61, MinecraftSteve_73, Minerva_114, Mistmere_85, Mudcat_61, Myxus_70, Naca_64, Nason_65, NearlyHeadless_76, Nebulosus_70, Nedarya_68, Neeharika16_66, Newrala_67, Nibley_104, NicoleTera_65, NihilNomen_118, Odette_118, Omega_120, Onglai_69, Oofda_73, Optimus_108, PackMan_69, PainterBoy_68, PetterN_69, Phaeder_70, Phillis_73, Phlorence_62, Phoebus_117, Phonnegut_70, PickleBack_64, Pioneer_70, Pmask_66, Polyphemus_69, Pomar16_68, Porcelain_111, Pound_106, Priamo_69, Prinashe11_61, Priya_68, Qobbit_68, Quokka_69, Ravana_74, ReMo_71, Rearden_105, Redno2_108, Refuge_64, Remus_73, Rifter_68, Roary_77, Roksolana_69, Rosalind_71, RyeScarlet_70, Sachima_70, Saintus_71, Schatzie_111, Scherzo_69, Scorpia_66, Serenity_71, Shaboozey_109, ShayRa_73, SmellyB_67, SororFago_68, Soups_73, Spouty_68, Squint_109, StarStuff_69, Steamy_64, Strosahl_73, SuMoo_38, Sunhee_69, SuperAwesome_67, SuperCallie99_64, Superphikiman_108, SwirlSquare_72, Swirley_63, Switzerland_72, Tarynearal_60, Temprado_69, Thibault_97, ThreeRngTarjay_113, Tiger_63, TipsytheTRex_67, Toaka_69, ToneTone_65, Tubs_70, Tucker_68, Twigg_61, Ugenie5_65, UnionJack_65, VohminGhazi_67, Waits_73, Wanda_117, Warrior24_74, Weasels2_222, Wiks_67, WunderPhul_68, Xenomorph_61,

Xiaokay_105, Yeet_107, Yokurt_67, Zaka_68, Zelink_112, Zimmer_64, Zulu_69,

Genes that have the "Most Annotated" start but do not call it:
• Adzzy_70, Che12_70, D29_64, Duplo_69, Kerberos_69, Naji_69, Odin_67, Ph8s_70, Superchunk_68, Tomathan_69, Travvers_68,

Genes that do not have the "Most Annotated" start:
• 39HC_050, 40BC_050, AWGoat_42, AbbysRanger_62, AceofSpades_32, Achebe_61, Agatha_63, Alleb_84, Amgine_53, Amohnition_55, Anedea_218, Anthony_59, Aphelion_113, Applecrisp_52, Arissanae_67, Astro_76, AvatarAhPeg_61, Axym_62, Aziz_46, BRock_144, BabyBack_64, Backyardigan_60, Bactobuster_63, Badger_61, Barb_81, Beagle_56, BeeGee_57, Beleetus_152, Bellris_68, BetaFish_56, Beuffert_99, BlackJade_94, BlingBling_60, Bloom_243, Blueeyedbeauty_248, BogosyJay_69, BrutonGaster_92, Bubble_62, Bumblebee11_61, C3PO_66, Caitlin_75, Cantare_111, Cassini_68, Celestialunch_65, Chargerpower_64, Charm_65, CheeseSpider_70, ChewyVIII_67, Chilliams_222, Cici_62, Cindaradix_59, ClamChowder_81, CogOmlette_66, Confidence_51, Cozz_62, Crescenzo_74, Cruella_66, Cubone_47, Darrell_71, DarthP_55, DarwinJr_76, Darwin_67, Datway_62, Dennebes_82, Destructrice_76, Ding_64, Dixon_75, DogYard_55, DreamTeam1_65, Ekdilam_52, Elephantoon_68, Ellie_51, Emotion_32, Estes_48, Expelliarmus_73, Fefferhead_53, Fenry_62, FiveHead_35, FloraSnap32_234, ForDig_51, Forrestell_53, Frankie_67, FrostedClock_241, Fugax_82, Funsized_63, Fury_24, GardenSalsa_48, Garnacho_147, GaugeLDP_63, GenevaB15_46, GoldHunter_63, GoldenEssence_228, Groundhog_75, Hammy_55, HaugeAnator_77, Herbertwm_63, Hive_53, HomeFry_21, Hortus1_86, Hosp_049, Hyzer_57, Imvubu_55, IronMan_65, Iwokeuplikedis_68, JPandJE_76, Jaan_66, JakeTheSnake_76, JasmineDragon_32, Jecs_53, JohnThicc_32, Jolie1_051, Katalie136_62, KayaCho_50, Keziacharles14_67, Kharcho_11, Kimchi1738_67, Klodlith_65, Kubulix_56, LadyAstra_32, Landor_66, LastHope_56, Lavahound_52, LeBruni_72, LilJank_68, LilSaint_206, LilSpotty_61, Lilleskat_69, Limpid_99, LoneWolf_69, LonelyBoi_50, Maminiaina_69, Manuel_75, Marshawn_55, MegTheThird_65, MellowYellow_53, MidnightRain_76, Mildred21_213, Mimi_239, MiniMommy_32, Minispark_66, Minnow_53, Miramae_61, Mireles_65, Mischief19_49, Miskis_107, Morpher26_62, MrMagoo_48, MulchSalad_57, Mundrea_62, MunkgeeRoachy_61, Muntaha_184, MyraDee_66, Nikan_57, Noelle_63, Norvs_114, NothingSpecial_64, November_53, Nyilah_74, NyleyClemson_51, Odyssey395_58, Olicious_77, OlinDD_86, OneUp_99, Opie_54, Origami_32, Ottawa_11, Patbob_237, Percastrophe_77, Perplexer_62, PetiteSangsue_62, Petra_63, Phaded_64, Phrampa_232, PhuzzTulsa_53, Pioneer3_86, Platte_85, Pleakley_24, Pointis_54, Popstraw_52, Pukovnik_64, Pumpernickel_256, Pureglobe5_57, RADical_64, REQ2_61, RIPWilbur_53, Racecar_241, Rahalelujah_68, Ranunculus_51, RazzB_52, Ren19_55, Rey_48, Rideau_81, Rockabye_222, Romero_77, RootBeer_42, RosePharie_78, SJReid_248, Samba_63, Schnabeltier_52, Scruffy_7, Scuba_24, ShakeItOph_32, SheaKeira_64, Shinji_77, Shygu2_62, SilentRX_46, SirPhilip_55, Smeadley_76, Socotra_64, Starburst_63, Stasia_62, Stella_78, Stephig9_75, Stickynote_66, Stink_61, Tailonex_41, Talia1610_241, Tandem_86, TaronosaurasRx_55, TingHuaYa_54, Toniann_112, ToriToki_77, Tortellini_52, Treat_77, Tristan_64, Typhonomachy_62, VanDeWege_80, Vanisoa_67, VroomVroom_32, Wakanda_182, Wile_62, WorldCup_66, Wrigley_57, Xena_61, Yeezy_49, ZAYM_53, Zarbodnamra_63, ZooBear_77,

Summary by start number:

Start 89:
• Found in 26 of 484 (5.4%) of genes in pham
• Manual Annotations of this start: 12 of 435
• Called 46.2% of time when present
• Phage (with cluster) where this start called: Astro_76 (A8), Badger_61 (A4), Caitlin_75 (A8), Dixon_75 (A8), Expelliarmus_73 (A8), Groundhog_75 (A8), Morpher26_62 (A4), Perplexer_62 (A4), Smeadley_76 (A8), Stephig9_75 (A8), Wile_62 (A4), Xena_61 (A4),

Start 101:
• Found in 7 of 484 (1.4%) of genes in pham
• Manual Annotations of this start: 5 of 435
• Called 71.4% of time when present
• Phage (with cluster) where this start called: Adzzy_70 (A2), Che12_70 (A2), Odin_67 (A2), Ph8s_70 (A2), Superchunk_68 (A2),

Start 104:
• Found in 27 of 484 (5.6%) of genes in pham
• Manual Annotations of this start: 5 of 435
• Called 22.2% of time when present
• Phage (with cluster) where this start called: D29_64 (A2), Duplo_69 (A2), Kerberos_69 (A2), Naji_69 (A2), Tomathan_69 (A2), Travvers_68 (A2),

Start 107:
• Found in 5 of 484 (1.0%) of genes in pham
• Manual Annotations of this start: 3 of 435
• Called 60.0% of time when present
• Phage (with cluster) where this start called: MellowYellow_53 (AP2), NyleyClemson_51 (AP2), RazzB_52 (AP2),

Start 109:
• Found in 10 of 484 (2.1%) of genes in pham
• Manual Annotations of this start: 8 of 435
• Called 90.0% of time when present
• Phage (with cluster) where this start called: Bloom_243 (FC), FloraSnap32_234 (FC), FrostedClock_241 (FC), GoldenEssence_228 (FC), Mimi_239 (FC), Patbob_237 (FC), Phrampa_232 (FC), Racecar_241 (FC), Talia1610_241 (FC),

Start 110:
• Found in 2 of 484 (0.4%) of genes in pham
• Manual Annotations of this start: 2 of 435
• Called 100.0% of time when present
• Phage (with cluster) where this start called: BrutonGaster_92 (CQ2), OneUp_99 (CQ2),

Start 111:
• Found in 1 of 484 (0.2%) of genes in pham
• Manual Annotations of this start: 1 of 435
• Called 100.0% of time when present
• Phage (with cluster) where this start called: SJReid_248 (FC),

Start 112:

• Found in 18 of 484 (3.7%) of genes in pham
• Manual Annotations of this start: 10 of 435
• Called 55.6% of time when present
• Phage (with cluster) where this start called: Beagle_56 (AP2), DogYard_55 (AP2), Forrestell_53 (AP2), Kubulix_56 (AP2), Odyssey395_58 (AP2), Pointis_54 (AP2), Pureglobe5_57 (AP2), RIPWilbur_53 (AP2), Schnabeltier_52 (DB), TaronosaurasRx_55 (DB),

Start 113:
• Found in 4 of 484 (0.8%) of genes in pham
• Manual Annotations of this start: 4 of 435
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Aphelion_113 (CQ1), Miskis_107 (CQ1), Norvs_114 (CQ1), Toniann_112 (CQ1),

Start 114:
• Found in 9 of 484 (1.9%) of genes in pham
• Manual Annotations of this start: 6 of 435
• Called 66.7% of time when present
• Phage (with cluster) where this start called: AWGoat_42 (AP4), Funsized_63 (B9), Nikan_57 (AP2), Ranunculus_51 (AP), Ren19_55 (AP2), SilentRX_46 (AP4),

Start 115:
• Found in 1 of 484 (0.2%) of genes in pham
• Manual Annotations of this start: 1 of 435
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Rockabye_222 (FC),

Start 116:
• Found in 3 of 484 (0.6%) of genes in pham
• Manual Annotations of this start: 2 of 435
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Celestialunch_65 (A9), Marshawn_55 (K6), MegTheThird_65 (A9),

Start 117:
• Found in 4 of 484 (0.8%) of genes in pham
• Manual Annotations of this start: 4 of 435
• Called 100.0% of time when present
• Phage (with cluster) where this start called: BabyBack_64 (A2), GaugeLDP_63 (A2), Imvubu_55 (B10), NothingSpecial_64 (A2),

Start 118:
• Found in 20 of 484 (4.1%) of genes in pham
• Manual Annotations of this start: 14 of 435
• Called 70.0% of time when present
• Phage (with cluster) where this start called: AbbysRanger_62 (A4), Achebe_61 (A4), Backyardigan_60 (A4), Bumblebee11_61 (A4), Cici_62 (A4), Cindaradix_59 (A4), Datway_62 (A4), Iwokeuplikedis_68 (A2), Katalie136_62 (A4), Mundrea_62 (A4), Noelle_63 (A4), PetiteSangsue_62 (A4), Shygu2_62 (A4), Stasia_62 (A4),

Start 119:
• Found in 28 of 484 (5.8%) of genes in pham

• Manual Annotations of this start: 24 of 435
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Arissanae_67 (A9), Bactobuster_63 (A2), Bellris_68 (A9), BogosyJay_69 (A9), Chargerpower_64 (A22), Charm_65 (A9), CogOmlette_66 (A9), Darrell_71 (A9), DreamTeam1_65 (A9), Elephantoon_68 (A9), Herbertwm_63 (A2), IronMan_65 (A2), Jaan_66 (A2), Keziacharles14_67 (A9), Klodlith_65 (A9), Landor_66 (A2), Lilleskat_69 (A9), LoneWolf_69 (A9), Maminiaina_69 (A9), Minispark_66 (A9), MyraDee_66 (A18), Phaded_64 (A2), Pukovnik_64 (A2), Rahalelujah_68 (A9), SheaKeira_64 (A9), Tristan_64 (A2), Vanisoa_67 (A9), WorldCup_66 (A9),

Start 120:
• Found in 7 of 484 (1.4%) of genes in pham
• Manual Annotations of this start: 7 of 435
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Alleb_84 (ED1), Hortus1_86 (ED1), OlinDD_86 (ED1), Pioneer3_86 (ED1), Platte_85 (ED1), Pumpernickel_256 (GD4), Tandem_86 (ED1),

Start 121:
• Found in 22 of 484 (4.5%) of genes in pham
• Manual Annotations of this start: 17 of 435
• Called 90.9% of time when present
• Phage (with cluster) where this start called: Amohnition_55 (K6), BlingBling_60 (CV), CheeseSpider_70 (CV), DarthP_55 (K6), Fenry_62 (CV), Fury_24 (CR5), Hammy_55 (K6), HomeFry_21 (CR5), Jecs_53 (DB), LilJank_68 (DU2), November_53 (K6), Opie_54 (DB), Petra_63 (CV), Pleakley_24 (CR5), REQ2_61 (singleton), Samba_63 (CV), Scuba_24 (CR5), SirPhilip_55 (K6), ZAYM_53 (DB), Zarbodnamra_63 (CV),

Start 122:
• Found in 246 of 484 (50.8%) of genes in pham
• Manual Annotations of this start: 218 of 435
• Called 95.5% of time when present
• Phage (with cluster) where this start called: AgentM_63 (A5), Airmid_64 (A5), Aliter_71 (A9), Alma_68 (A9), Anaysia_73 (A15), Anon_71 (A15), Aragog_63 (A5), Arcadia_65 (AM), ArcherNM_61 (A2), Ariel_111 (J), Artemis2UCLA_68 (A6), Ayanochan_67 (A9), BABullseye_60 (A6), BAKA_117 (J), Bagrid_117 (J), Battleship_75 (A15), Beem_118 (J), Beemo_70 (A9), Benedict_65 (A5), BennyP_68 (A6), BlessJoy_68 (A6), Blinn1_70 (A6), Blue7_69 (A6), Bobby_110 (J), Bombitas_104 (J), Bonamassa_61 (A5), Boohoo_73 (A15), Bowling_65 (AM), Bradman_70 (A2), BronnyJames_109 (J), Candra_68 (A6), Caraxes_68 (A2), Catalina_72 (A9), Chadwick_66 (A5), Chartreuse_66 (A6), CloudWang3_69 (A6), Conquerage_68 (A9), Conspiracy_64 (A5), Constella_99 (J), Coog_60 (A5), Cookiedough_67 (A6), Courthouse_106 (J), Cuco_62 (A5), D32_68 (A2), DBQu4n_69 (A2), DaVinci_65 (A6), Dallas_117 (J), Danforth_76 (A8), DarthPhader_64 (A12), DekHockey33_74 (A15), DelvinSonDorr_64 (A6), Discoknowium_61 (A5), DmpstrDiver_117 (J), Dorothea_67 (A6), Dove_102 (J), Duke13_112 (J), EZMoney23_65 (A2), EagleEye_70 (A16), EdogawaKiddo_70 (A9), Eidsmoe_68 (A9), Ejimix_110 (J), ElTiger69_66 (A5), Elle_67 (A15), Elsa_65 (AM), EmyBug_67 (A9), Epsocamisio_69 (A15), EricB_66 (A6), EricMillard_109 (J), ExplosioNervosa_68 (A9), Fayely_68 (A9), Florence1_58 (A5), Florence4_60 (A5), ForGetIt_64 (A5), Gail_68 (A14), Garak_69 (A6), George_58 (A5), Gladiator_65 (A6), Gonephishing_105 (J), Gruunaga_68 (A6), Halley_118 (J), Hammer_68 (A6),

Hannaconda_102 (J), Hanray_70 (A9), Heisenberger_63 (AM), Helmet_70 (A6), Hexamo_68 (A6), Hidrated_100 (J), HokkenD_106 (J), Holex_70 (A9), Hoot_62 (A6), HortumSL17_71 (A9), Hughesyang_115 (J), HuhtaEnerson15_61 (A5), Imbriano_69 (A6), Indra_71 (A6), Isiphiwo_65 (A6), JEGGS_63 (AM), JSwag_72 (A15), Jabiru_65 (A5), Jeeves_70 (A14), Jeffabunny_68 (A6), JewelBug_67 (A6), Jiawan_70 (A9), Jordennis_66 (A6), Jovo_64 (A5), Jsquared_71 (A2), JuicyJay_113 (J), Kalah2_109 (J), KashFlow_108 (J), KatherineG_73 (A15), Kazan_68 (A6), Kinmap_67 (A21), Kipper29_67 (A6), Klein_114 (J), Koduck_69 (A2), Koko_70 (A6), L5_64 (A2), LastResort_71 (A15), Lev2_64 (A5), Lilbunny_67 (A6), LittleCherry_61 (A5), LittleE_115 (J), Looper_72 (A15), Lucky2013_108 (J), Lucyedi_69 (A16), Mabodamaca_38 (EH), MajorMajor_69 (A2), Marleymoo_100 (J), McFly_67 (A6), MiaZeal_111 (J), Midas2_60 (A5), Milcery_61 (A5), MinecraftSteve_73 (A15), Minerva_114 (J), Mistmere_85 (ED3), Mudcat_61 (AM), Myxus_70 (A9), Naca_64 (A5), Nason_65 (AM), NearlyHeadless_76 (A8), Nebulosus_70 (A15), Nedarya_68 (A15), Neeharika16_66 (A6), Newrala_67 (A6), Nibley_104 (J), NicoleTera_65 (A2), NihilNomen_118 (J), Odette_118 (J), Omega_120 (J), Onglai_69 (A9), Oofda_73 (A15), Optimus_108 (J), PackMan_69 (A9), PainterBoy_68 (A16), PetterN_69 (A5), Phaeder_70 (A9), Phillis_73 (A8), Phlorence_62 (A5), Phoebus_117 (J), Phonnegut_70 (A9), PickleBack_64 (A5), Pioneer_70 (A9), Pmask_66 (A6), Polyphemus_69 (A6), Pomar16_68 (A2), Porcelain_111 (J), Pound_106 (J), Priamo_69 (A6), Prinashe11_61 (A5), Priya_68 (A9), Qobbit_68 (A9), Quokka_69 (A2), Ravana_74 (A15), ReMo_71 (A15), Rearden_105 (J), Redno2_108 (J), Refuge_64 (A12), Remus_73 (A15), Rifter_68 (A6), Roary_77 (A8), Roksolana_69 (A6), Rosalind_71 (A15), RyeScarlet_70 (A9), Sachima_70 (A9), Saintus_71 (A8), Schatzie_111 (J), Scherzo_69 (A9), Scorpia_66 (A5), Serenity_71 (A2), Shaboozey_109 (J), ShayRa_73 (A15), SmellyB_67 (A6), SororFago_68 (A14), Soups_73 (A15), Spouty_68 (A9), Squint_109 (J), StarStuff_69 (A2), Steamy_64 (A12), Strosahl_73 (A15), SuMoo_38 (EH), Sunhee_69 (A14), SuperAwesome_67 (A6), SuperCallie99_64 (A6), Superphikiman_108 (J), SwirlSquare_72 (A2), Swirley_63 (A5), Switzerland_72 (A15), Tarynearal_60 (A5), Temprado_69 (A6), Thibault_97 (J), ThreeRngTarjay_113 (J), Tiger_63 (A5), TipsytheTRex_67 (A2), Toaka_69 (A9), ToneTone_65 (A6), Tubs_70 (A9), Tucker_68 (A6), Twigg_61 (A5), Ugenie5_65 (A9), UnionJack_65 (A5), VohminGhazi_67 (A6), Waits_73 (A15), Wanda_117 (J), Warrior24_74 (A15), Weasels2_222 (CB), Wiks_67 (A6), WunderPhul_68 (A6), Xenomorph_61 (AM), Xiaokay_105 (J), Yeet_107 (J), Yokurt_67 (A6), Zaka_68 (A6), Zelink_112 (J), Zimmer_64 (A12), Zulu_69 (A6),

Start 123:
• Found in 49 of 484 (10.1%) of genes in pham
• Manual Annotations of this start: 33 of 435
• Called 83.7% of time when present
• Phage (with cluster) where this start called: AceofSpades_32 (AZ4), Amgine_53 (K6), Applecrisp_52 (K6), Barb_81 (DC1), BeeGee_57 (CY5), BetaFish_56 (AP2), Cassini_68 (FN), ClamChowder_81 (DC1), Confidence_51 (CY1), Crescenzo_74 (AY), DarwinJr_76 (AY), Ding_64 (AY), Ekdilam_52 (K6), Ellie_51 (K6), Emotion_32 (AZ4), Fefferhead_53 (K6), FiveHead_35 (AZ4), Fugax_82 (DC1), Hive_53 (AP2), Hyzer_57 (CZ1), JakeTheSnake_76 (AY), JasmineDragon_32 (AZ4), JohnThicc_32 (AZ4), Kharcho_11 (FM), LadyAstra_32 (AZ4), Lavahound_52 (K6), LonelyBoi_50 (CY7), MidnightRain_76 (AY), MiniMommy_32 (AZ4), Nyilah_74 (AY), Origami_32 (AZ4), Ottawa_11 (FM), PhuzzTulsa_53 (AP2), Popstraw_52 (AP2), RootBeer_42 (FA), ShakeItOph_32 (AZ4), Shinji_77 (DC1), VanDeWege_80 (DC1), VroomVroom_32 (AZ4), Wrigley_57 (CY4), Yeezy_49 (CZ3),

Start 124:
• Found in 8 of 484 (1.7%) of genes in pham
• Manual Annotations of this start: 3 of 435
• Called 37.5% of time when present
• Phage (with cluster) where this start called: AvatarAhPeg_61 (A4), Miramae_61 (A4), Stink_61 (A4),

Start 125:
• Found in 7 of 484 (1.4%) of genes in pham
• Manual Annotations of this start: 2 of 435
• Called 100.0% of time when present
• Phage (with cluster) where this start called: 39HC_050 (B6), 40BC_050 (B6), ForDig_51 (B6), Hosp_049 (B6), Jolie1_051 (B6), KayaCho_50 (B6), Minnow_53 (B6),

Start 126:
• Found in 3 of 484 (0.6%) of genes in pham
• Manual Annotations of this start: 1 of 435
• Called 66.7% of time when present
• Phage (with cluster) where this start called: LastHope_56 (K1), TingHuaYa_54 (K1),

Start 127:
• Found in 1 of 484 (0.2%) of genes in pham
• Manual Annotations of this start: 1 of 435
• Called 100.0% of time when present
• Phage (with cluster) where this start called: ChewyVIII_67 (singleton),

Start 128:
• Found in 5 of 484 (1.0%) of genes in pham
• Manual Annotations of this start: 5 of 435
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Cubone_47 (N), Frankie_67 (F1), LilSpotty_61 (singleton), MulchSalad_57 (F7), Tortellini_52 (P2),

Start 129:
• Found in 10 of 484 (2.1%) of genes in pham
• Manual Annotations of this start: 8 of 435
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Agatha_63 (CT), Axym_62 (CT), Bubble_62 (CT), Cozz_62 (CT), GoldHunter_63 (CT), MunkgeeRoachy_61 (CT), RADical_64 (CT), Socotra_64 (CT), Starburst_63 (CT), Typhonomachy_62 (CT),

Start 130:
• Found in 6 of 484 (1.2%) of genes in pham
• Manual Annotations of this start: 6 of 435
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Aziz_46 (M2), Estes_48 (M2), GardenSalsa_48 (M2), GenevaB15_46 (M2), MrMagoo_48 (M2), Rey_48 (M2),

Start 132:
• Found in 37 of 484 (7.6%) of genes in pham
• Manual Annotations of this start: 33 of 435
• Called 100.0% of time when present

• Phage (with cluster) where this start called: Anedea_218 (BE1), Anthony_59 (A20), BRock_144 (BS), Beleetus_152 (BS), Beuffert_99 (BK1), Blueeyedbeauty_248 (BK1), C3PO_66 (EN), Cantare_111 (singleton), Cruella_66 (EN), Darwin_67 (EN), Dennebes_82 (BF), Destructrice_76 (BF), Garnacho_147 (BS), HaugeAnator_77 (BF), JPandJE_76 (BF), Kimchi1738_67 (EN), LeBruni_72 (AY), LilSaint_206 (BE1), Limpid_99 (BK1), Manuel_75 (BF), Mildred21_213 (BE1), Mireles_65 (FR), Mischief19_49 (BG), Muntaha_184 (BK2), Olicious_77 (BF), Percastrophe_77 (BF), Rideau_81 (BF), Romero_77 (BF), RosePharie_78 (BF), Scruffy_7 (EM1), Stella_78 (BF), Stickynote_66 (EN), Tailonex_41 (singleton), ToriToki_77 (BF), Treat_77 (BF), Wakanda_182 (BK2), ZooBear_77 (BF),

Start 135:
• Found in 2 of 484 (0.4%) of genes in pham
• No Manual Annotations of this start.
• Called 50.0% of time when present
• Phage (with cluster) where this start called: BlackJade_94 (FL),

Start 143:
• Found in 32 of 484 (6.6%) of genes in pham
• No Manual Annotations of this start.
• Called 3.1% of time when present
• Phage (with cluster) where this start called: Chilliams_222 (FC),

Summary by clusters:

There are 65 clusters represented in this pham: BF, BG, GD4, ED3, AP2, CZ3, FR, BS, DB, singleton, AP4, FA, K1, ED1, K6, B10, M2, FL, FM, FN, A15, A14, A16, CZ1, A12, CY4, A18, A2, A5, A4, A6, A9, A8, DU2, DC1, P2, CY1, EN, CY7, EH, CY5, A21, CB, J, AM, N, AP, BK1, BK2, CQ2, AY, CV, CT, A20, F1, A22, CQ1, CR5, F7, B6, FC, EM1, BE1, AZ4, B9,

Info for manual annotations of cluster A12:
•Start number 122 was manually annotated 4 times for cluster A12.

Info for manual annotations of cluster A14:
•Start number 122 was manually annotated 4 times for cluster A14.

Info for manual annotations of cluster A15:
•Start number 122 was manually annotated 25 times for cluster A15.

Info for manual annotations of cluster A16:
•Start number 122 was manually annotated 3 times for cluster A16.

Info for manual annotations of cluster A18:
•Start number 119 was manually annotated 1 time for cluster A18.

Info for manual annotations of cluster A2:
•Start number 101 was manually annotated 5 times for cluster A2.
•Start number 104 was manually annotated 5 times for cluster A2.
•Start number 117 was manually annotated 3 times for cluster A2.
•Start number 118 was manually annotated 1 time for cluster A2.
•Start number 119 was manually annotated 8 times for cluster A2.
•Start number 122 was manually annotated 14 times for cluster A2.

Info for manual annotations of cluster A20:
•Start number 132 was manually annotated 1 time for cluster A20.

Info for manual annotations of cluster A21:
•Start number 122 was manually annotated 1 time for cluster A21.

Info for manual annotations of cluster A22:
•Start number 119 was manually annotated 1 time for cluster A22.

Info for manual annotations of cluster A4:
•Start number 89 was manually annotated 5 times for cluster A4.
•Start number 118 was manually annotated 13 times for cluster A4.
•Start number 124 was manually annotated 3 times for cluster A4.

Info for manual annotations of cluster A5:
•Start number 122 was manually annotated 31 times for cluster A5.

Info for manual annotations of cluster A6:
•Start number 122 was manually annotated 49 times for cluster A6.

Info for manual annotations of cluster A8:
•Start number 89 was manually annotated 7 times for cluster A8.
•Start number 122 was manually annotated 5 times for cluster A8.

Info for manual annotations of cluster A9:
•Start number 116 was manually annotated 1 time for cluster A9.
•Start number 119 was manually annotated 14 times for cluster A9.
•Start number 122 was manually annotated 30 times for cluster A9.

Info for manual annotations of cluster AM:
•Start number 122 was manually annotated 8 times for cluster AM.

Info for manual annotations of cluster AP:
•Start number 114 was manually annotated 1 time for cluster AP.

Info for manual annotations of cluster AP2:
•Start number 107 was manually annotated 3 times for cluster AP2.
•Start number 112 was manually annotated 8 times for cluster AP2.
•Start number 114 was manually annotated 2 times for cluster AP2.
•Start number 123 was manually annotated 1 time for cluster AP2.

Info for manual annotations of cluster AP4:
•Start number 114 was manually annotated 2 times for cluster AP4.

Info for manual annotations of cluster AY:
•Start number 123 was manually annotated 4 times for cluster AY.
•Start number 132 was manually annotated 1 time for cluster AY.

Info for manual annotations of cluster AZ4:
•Start number 123 was manually annotated 8 times for cluster AZ4.

Info for manual annotations of cluster B10:

•Start number 117 was manually annotated 1 time for cluster B10.

Info for manual annotations of cluster B6:
•Start number 125 was manually annotated 2 times for cluster B6.

Info for manual annotations of cluster B9:
•Start number 114 was manually annotated 1 time for cluster B9.

Info for manual annotations of cluster BE1:
•Start number 132 was manually annotated 3 times for cluster BE1.

Info for manual annotations of cluster BF:
•Start number 132 was manually annotated 13 times for cluster BF.

Info for manual annotations of cluster BG:
•Start number 132 was manually annotated 1 time for cluster BG.

Info for manual annotations of cluster BK1:
•Start number 132 was manually annotated 3 times for cluster BK1.

Info for manual annotations of cluster BK2:
•Start number 132 was manually annotated 2 times for cluster BK2.

Info for manual annotations of cluster BS:
•Start number 132 was manually annotated 2 times for cluster BS.

Info for manual annotations of cluster CB:
•Start number 122 was manually annotated 1 time for cluster CB.

Info for manual annotations of cluster CQ1:
•Start number 113 was manually annotated 4 times for cluster CQ1.

Info for manual annotations of cluster CQ2:
•Start number 110 was manually annotated 2 times for cluster CQ2.

Info for manual annotations of cluster CR5:
•Start number 121 was manually annotated 4 times for cluster CR5.

Info for manual annotations of cluster CT:
•Start number 129 was manually annotated 8 times for cluster CT.

Info for manual annotations of cluster CV:
•Start number 121 was manually annotated 6 times for cluster CV.

Info for manual annotations of cluster CY1:
•Start number 123 was manually annotated 1 time for cluster CY1.

Info for manual annotations of cluster CY4:
•Start number 123 was manually annotated 1 time for cluster CY4.

Info for manual annotations of cluster CY5:
•Start number 123 was manually annotated 1 time for cluster CY5.

Info for manual annotations of cluster CY7:
•Start number 123 was manually annotated 1 time for cluster CY7.

Info for manual annotations of cluster CZ1:
•Start number 123 was manually annotated 1 time for cluster CZ1.

Info for manual annotations of cluster CZ3:
•Start number 123 was manually annotated 1 time for cluster CZ3.

Info for manual annotations of cluster DB:
•Start number 112 was manually annotated 2 times for cluster DB.
•Start number 121 was manually annotated 1 time for cluster DB.

Info for manual annotations of cluster DC1:
•Start number 123 was manually annotated 4 times for cluster DC1.

Info for manual annotations of cluster DU2:
•Start number 121 was manually annotated 1 time for cluster DU2.

Info for manual annotations of cluster ED1:
•Start number 120 was manually annotated 6 times for cluster ED1.

Info for manual annotations of cluster EH:
•Start number 122 was manually annotated 2 times for cluster EH.

Info for manual annotations of cluster EN:
•Start number 132 was manually annotated 5 times for cluster EN.

Info for manual annotations of cluster F1:
•Start number 128 was manually annotated 1 time for cluster F1.

Info for manual annotations of cluster F7:
•Start number 128 was manually annotated 1 time for cluster F7.

Info for manual annotations of cluster FA:
•Start number 123 was manually annotated 1 time for cluster FA.

Info for manual annotations of cluster FC:
•Start number 109 was manually annotated 8 times for cluster FC.
•Start number 111 was manually annotated 1 time for cluster FC.
•Start number 115 was manually annotated 1 time for cluster FC.

Info for manual annotations of cluster FM:
•Start number 123 was manually annotated 2 times for cluster FM.

Info for manual annotations of cluster FN:
•Start number 123 was manually annotated 1 time for cluster FN.

Info for manual annotations of cluster FR:
•Start number 132 was manually annotated 1 time for cluster FR.

Info for manual annotations of cluster GD4:
•Start number 120 was manually annotated 1 time for cluster GD4.

Info for manual annotations of cluster J:
•Start number 122 was manually annotated 41 times for cluster J.

Info for manual annotations of cluster K1:
•Start number 126 was manually annotated 1 time for cluster K1.

Info for manual annotations of cluster K6:
•Start number 116 was manually annotated 1 time for cluster K6.
•Start number 121 was manually annotated 5 times for cluster K6.
•Start number 123 was manually annotated 6 times for cluster K6.

Info for manual annotations of cluster M2:
•Start number 130 was manually annotated 6 times for cluster M2.

Info for manual annotations of cluster N:
•Start number 128 was manually annotated 1 time for cluster N.

Info for manual annotations of cluster P2:
•Start number 128 was manually annotated 1 time for cluster P2.

Gene Information:

Gene: 39HC_050 Start: 50405, Stop: 50022, Start Num: 125
Candidate Starts for 39HC_050:
(Start: 125 @50405 has 2 MA's), (152, 50327), (160, 50267), (165, 50240), (169, 50210), (174, 50183), (177, 50165), (186, 50126), (191, 50114), (202, 50051),

Gene: 40BC_050 Start: 50405, Stop: 50022, Start Num: 125
Candidate Starts for 40BC_050:
(Start: 125 @50405 has 2 MA's), (152, 50327), (160, 50267), (165, 50240), (169, 50210), (174, 50183), (177, 50165), (186, 50126), (191, 50114), (202, 50051),

Gene: AWGoat_42 Start: 36187, Stop: 35780, Start Num: 114
Candidate Starts for AWGoat_42:
(Start: 114 @36187 has 6 MA's), (174, 35956), (193, 35875), (200, 35836),

Gene: AbbysRanger_62 Start: 41338, Stop: 40955, Start Num: 118
Candidate Starts for AbbysRanger_62:
(Start: 89 @41350 has 12 MA's), (Start: 118 @41338 has 14 MA's), (174, 41116), (186, 41059), (191, 41047), (196, 41023), (200, 40999),

Gene: AceofSpades_32 Start: 23405, Stop: 23797, Start Num: 123
Candidate Starts for AceofSpades_32:
(Start: 123 @23405 has 33 MA's), (174, 23624),

Gene: Achebe_61 Start: 41321, Stop: 40938, Start Num: 118
Candidate Starts for Achebe_61:

(Start: 89 @41333 has 12 MA's), (Start: 118 @41321 has 14 MA's), (174, 41099), (186, 41042), (191, 41030), (196, 41006), (200, 40982),

Gene: Adzzy_70 Start: 40512, Stop: 40099, Start Num: 101
Candidate Starts for Adzzy_70:
(59, 40587), (Start: 101 @40512 has 5 MA's), (Start: 122 @40488 has 218 MA's), (148, 40437), (151, 40407), (158, 40350), (174, 40260), (191, 40191), (203, 40125),

Gene: Agatha_63 Start: 43367, Stop: 43753, Start Num: 129
Candidate Starts for Agatha_63:
(Start: 129 @43367 has 8 MA's), (166, 43541), (179, 43619), (182, 43631), (189, 43655), (190, 43658), (196, 43685), (199, 43706),

Gene: AgentM_63 Start: 40512, Stop: 40123, Start Num: 122
Candidate Starts for AgentM_63:
(Start: 122 @40512 has 218 MA's), (148, 40461), (158, 40374), (174, 40284), (182, 40245), (191, 40215),

Gene: Airmid_64 Start: 40674, Stop: 40285, Start Num: 122
Candidate Starts for Airmid_64:
(Start: 122 @40674 has 218 MA's), (148, 40623), (158, 40536), (164, 40506), (174, 40446), (191, 40377),

Gene: Aliter_71 Start: 41360, Stop: 40974, Start Num: 122
Candidate Starts for Aliter_71:
(Start: 122 @41360 has 218 MA's), (138, 41333), (140, 41324), (158, 41225), (174, 41135), (186, 41078), (191, 41066), (206, 40982),

Gene: Alleb_84 Start: 51042, Stop: 50629, Start Num: 120
Candidate Starts for Alleb_84:
(Start: 120 @51042 has 7 MA's), (166, 50856), (191, 50736), (192, 50730), (196, 50712),

Gene: Alma_68 Start: 41339, Stop: 40953, Start Num: 122
Candidate Starts for Alma_68:
(Start: 122 @41339 has 218 MA's), (138, 41312), (140, 41303), (158, 41204), (174, 41114), (191, 41045), (206, 40961),

Gene: Amgine_53 Start: 39598, Stop: 39984, Start Num: 123
Candidate Starts for Amgine_53:
(Start: 123 @39598 has 33 MA's), (138, 39625), (151, 39682), (158, 39739), (184, 39868), (186, 39880), (199, 39937), (202, 39955), (204, 39961),

Gene: Amohnition_55 Start: 39555, Stop: 39944, Start Num: 121
Candidate Starts for Amohnition_55:
(Start: 121 @39555 has 17 MA's), (138, 39582), (151, 39639), (157, 39693), (158, 39696), (174, 39780), (186, 39840), (199, 39897), (202, 39915),

Gene: Anaysia_73 Start: 40644, Stop: 40246, Start Num: 122
Candidate Starts for Anaysia_73:
(64, 40770), (66, 40767), (67, 40764), (Start: 122 @40644 has 218 MA's), (158, 40503), (166, 40455), (196, 40314),

Gene: Anedea_218 Start: 106894, Stop: 107316, Start Num: 132

Candidate Starts for Anedea_218:
(56, 106732), (62, 106750), (79, 106786), (Start: 132 @106894 has 33 MA's), (155, 107023),

Gene: Anon_71 Start: 40533, Stop: 40135, Start Num: 122
Candidate Starts for Anon_71:
(41, 40758), (64, 40659), (66, 40656), (67, 40653), (83, 40617), (88, 40608), (Start: 122 @40533 has 218 MA's), (158, 40386), (174, 40296), (200, 40179),

Gene: Anthony_59 Start: 38039, Stop: 37653, Start Num: 132
Candidate Starts for Anthony_59:
(Start: 132 @38039 has 33 MA's), (155, 37916), (167, 37862), (172, 37823), (196, 37721), (199, 37700), (203, 37679),

Gene: Aphelion_113 Start: 66485, Stop: 66889, Start Num: 113
Candidate Starts for Aphelion_113:
(Start: 113 @66485 has 4 MA's), (158, 66635), (199, 66842),

Gene: Applecrisp_52 Start: 39124, Stop: 39504, Start Num: 123
Candidate Starts for Applecrisp_52:
(Start: 123 @39124 has 33 MA's), (138, 39151), (148, 39175), (158, 39259), (160, 39265), (186, 39400), (196, 39436), (199, 39457), (202, 39475), (204, 39481),

Gene: Aragog_63 Start: 40532, Stop: 40143, Start Num: 122
Candidate Starts for Aragog_63:
(Start: 122 @40532 has 218 MA's), (148, 40481), (158, 40394), (174, 40304), (182, 40265), (191, 40235),

Gene: Arcadia_65 Start: 41909, Stop: 42322, Start Num: 122
Candidate Starts for Arcadia_65:
(96, 41852), (Start: 104 @41876 has 5 MA's), (Start: 122 @41909 has 218 MA's), (155, 42038), (162, 42074), (175, 42140), (208, 42308),

Gene: ArcherNM_61 Start: 41338, Stop: 40952, Start Num: 122
Candidate Starts for ArcherNM_61:
(63, 41458), (99, 41389), (Start: 104 @41371 has 5 MA's), (Start: 122 @41338 has 218 MA's), (143, 41293), (151, 41260), (158, 41203), (174, 41113), (178, 41089), (191, 41044),

Gene: Ariel_111 Start: 60291, Stop: 60674, Start Num: 122
Candidate Starts for Ariel_111:
(Start: 122 @60291 has 218 MA's), (138, 60315), (158, 60423), (174, 60513), (186, 60570), (191, 60582),

Gene: Arissanae_67 Start: 41603, Stop: 41217, Start Num: 119
Candidate Starts for Arissanae_67:
(Start: 119 @41603 has 24 MA's), (158, 41468), (174, 41378), (176, 41366), (191, 41309),

Gene: Artemis2UCLA_68 Start: 39691, Stop: 39305, Start Num: 122
Candidate Starts for Artemis2UCLA_68:
(33, 39946), (Start: 122 @39691 has 218 MA's), (158, 39556), (174, 39466), (184, 39421), (191, 39397),

Gene: Astro_76 Start: 42589, Stop: 42107, Start Num: 89
Candidate Starts for Astro_76:

(Start: 89 @42589 has 12 MA's), (Start: 124 @42511 has 3 MA's), (151, 42415), (158, 42358), (174, 42268), (191, 42199),

Gene: AvatarAhPeg_61 Start: 41105, Stop: 40722, Start Num: 124
Candidate Starts for AvatarAhPeg_61:
(51, 41270), (Start: 124 @41105 has 3 MA's), (148, 41057), (151, 41030), (155, 40988), (158, 40973), (174, 40883), (191, 40814),

Gene: Axym_62 Start: 43254, Stop: 43640, Start Num: 129
Candidate Starts for Axym_62:
(Start: 129 @43254 has 8 MA's), (166, 43428), (179, 43506), (182, 43518), (189, 43542), (190, 43545), (196, 43572), (199, 43593),

Gene: Ayanochan_67 Start: 41122, Stop: 40736, Start Num: 122
Candidate Starts for Ayanochan_67:
(Start: 122 @41122 has 218 MA's), (138, 41095), (140, 41086), (158, 40987), (174, 40897), (191, 40828), (206, 40744),

Gene: Aziz_46 Start: 34794, Stop: 34402, Start Num: 130
Candidate Starts for Aziz_46:
(42, 35016), (48, 34974), (65, 34923), (68, 34914), (Start: 130 @34794 has 6 MA's), (151, 34710), (191, 34494), (199, 34449),

Gene: BABullseye_60 Start: 37359, Stop: 36973, Start Num: 122
Candidate Starts for BABullseye_60:
(Start: 122 @37359 has 218 MA's), (158, 37224), (174, 37134), (178, 37110), (181, 37098), (191, 37065),

Gene: BAKA_117 Start: 65040, Stop: 65426, Start Num: 122
Candidate Starts for BAKA_117:
(103, 65004), (Start: 122 @65040 has 218 MA's), (137, 65061), (158, 65172), (174, 65262), (175, 65265), (176, 65274), (178, 65289), (184, 65310), (191, 65334), (193, 65343), (199, 65379),

Gene: BRock_144 Start: 78265, Stop: 78675, Start Num: 132
Candidate Starts for BRock_144:
(Start: 132 @78265 has 33 MA's), (140, 78301), (149, 78328), (151, 78355), (165, 78445), (166, 78448), (191, 78568),

Gene: BabyBack_64 Start: 41878, Stop: 41492, Start Num: 117
Candidate Starts for BabyBack_64:
(Start: 117 @41878 has 4 MA's), (151, 41800), (155, 41758), (158, 41743), (174, 41653), (182, 41614), (191, 41584),

Gene: Backyardigan_60 Start: 41354, Stop: 40971, Start Num: 118
Candidate Starts for Backyardigan_60:
(Start: 89 @41366 has 12 MA's), (Start: 118 @41354 has 14 MA's), (174, 41132), (186, 41075), (191, 41063), (196, 41039), (200, 41015),

Gene: Bactobuster_63 Start: 42222, Stop: 41836, Start Num: 119
Candidate Starts for Bactobuster_63:
(Start: 119 @42222 has 24 MA's), (143, 42177), (151, 42144), (158, 42087), (174, 41997), (191, 41928),

Gene: Badger_61 Start: 41334, Stop: 40939, Start Num: 89
Candidate Starts for Badger_61:
(Start: 89 @41334 has 12 MA's), (Start: 118 @41322 has 14 MA's), (174, 41100), (186, 41043), (191, 41031), (196, 41007), (200, 40983),

Gene: Bagrid_117 Start: 64748, Stop: 65134, Start Num: 122
Candidate Starts for Bagrid_117:
(103, 64712), (Start: 122 @64748 has 218 MA's), (137, 64769), (158, 64880), (174, 64970), (175, 64973), (176, 64982), (178, 64997), (184, 65018), (191, 65042), (193, 65051), (199, 65087),

Gene: Barb_81 Start: 52690, Stop: 53085, Start Num: 123
Candidate Starts for Barb_81:
(16, 52267), (31, 52408), (47, 52507), (95, 52630), (Start: 123 @52690 has 33 MA's), (174, 52921), (186, 52981), (199, 53038),

Gene: Battleship_75 Start: 40851, Stop: 40453, Start Num: 122
Candidate Starts for Battleship_75:
(85, 40932), (Start: 122 @40851 has 218 MA's), (158, 40710), (166, 40662), (196, 40521),

Gene: Beagle_56 Start: 39658, Stop: 39236, Start Num: 112
Candidate Starts for Beagle_56:
(67, 39754), (Start: 112 @39658 has 10 MA's), (Start: 123 @39643 has 33 MA's), (145, 39586), (148, 39583), (159, 39493), (164, 39466), (172, 39418), (191, 39340), (200, 39292), (201, 39289),

Gene: BeeGee_57 Start: 38386, Stop: 38775, Start Num: 123
Candidate Starts for BeeGee_57:
(Start: 123 @38386 has 33 MA's), (151, 38470), (159, 38530), (165, 38560), (182, 38653), (186, 38671), (189, 38677), (190, 38680), (196, 38707), (205, 38761),

Gene: Beem_118 Start: 66102, Stop: 66488, Start Num: 122
Candidate Starts for Beem_118:
(103, 66066), (Start: 122 @66102 has 218 MA's), (137, 66123), (158, 66234), (174, 66324), (175, 66327), (176, 66336), (184, 66372), (191, 66396), (193, 66405), (199, 66441),

Gene: Beemo_70 Start: 41378, Stop: 40992, Start Num: 122
Candidate Starts for Beemo_70:
(Start: 122 @41378 has 218 MA's), (138, 41351), (140, 41342), (158, 41243), (174, 41153), (191, 41084), (206, 41000),

Gene: Beleetus_152 Start: 82067, Stop: 82498, Start Num: 132
Candidate Starts for Beleetus_152:
(Start: 132 @82067 has 33 MA's), (143, 82112), (151, 82157), (158, 82214), (161, 82229), (170, 82283), (174, 82304), (191, 82376),

Gene: Bellris_68 Start: 40850, Stop: 40464, Start Num: 119
Candidate Starts for Bellris_68:
(69, 40955), (70, 40952), (71, 40949), (81, 40931), (Start: 119 @40850 has 24 MA's), (158, 40715), (174, 40625), (191, 40556),

Gene: Benedict_65 Start: 40793, Stop: 40404, Start Num: 122
Candidate Starts for Benedict_65:
(80, 40826), (Start: 122 @40793 has 218 MA's), (143, 40748), (158, 40655), (164, 40625), (174, 40565), (191, 40496),

Gene: BennyP_68 Start: 39761, Stop: 39375, Start Num: 122
Candidate Starts for BennyP_68:
(33, 40016), (Start: 122 @39761 has 218 MA's), (158, 39626), (174, 39536), (184, 39491), (191, 39467),

Gene: BetaFish_56 Start: 40127, Stop: 39720, Start Num: 123
Candidate Starts for BetaFish_56:
(67, 40238), (Start: 112 @40142 has 10 MA's), (Start: 123 @40127 has 33 MA's), (145, 40070), (148, 40067), (159, 39977), (164, 39950), (172, 39902), (191, 39824), (200, 39776), (201, 39773),

Gene: Beuffert_99 Start: 68400, Stop: 68825, Start Num: 132
Candidate Starts for Beuffert_99:
(Start: 132 @68400 has 33 MA's), (144, 68445), (151, 68487), (180, 68664), (191, 68700), (199, 68745),

Gene: BlackJade_94 Start: 48225, Stop: 48626, Start Num: 135
Candidate Starts for BlackJade_94:
(135, 48225), (158, 48360), (174, 48444), (196, 48540), (204, 48585),

Gene: BlessJoy_68 Start: 40117, Stop: 39731, Start Num: 122
Candidate Starts for BlessJoy_68:
(33, 40372), (Start: 122 @40117 has 218 MA's), (158, 39982), (174, 39892), (184, 39847), (191, 39823),

Gene: BlingBling_60 Start: 40662, Stop: 41057, Start Num: 121
Candidate Starts for BlingBling_60:
(10, 40140), (82, 40575), (Start: 121 @40662 has 17 MA's), (138, 40695), (159, 40812), (182, 40935), (186, 40953), (189, 40959), (190, 40962), (199, 41010), (205, 41043),

Gene: Blinn1_70 Start: 39776, Stop: 39390, Start Num: 122
Candidate Starts for Blinn1_70:
(69, 39881), (70, 39878), (72, 39875), (84, 39857), (Start: 122 @39776 has 218 MA's), (143, 39731), (158, 39641), (174, 39551), (178, 39527), (181, 39515), (191, 39482),

Gene: Bloom_243 Start: 156000, Stop: 156422, Start Num: 109
Candidate Starts for Bloom_243:
(Start: 109 @156000 has 8 MA's), (140, 156060), (167, 156201), (174, 156246), (196, 156342), (197, 156348),

Gene: Blue7_69 Start: 39819, Stop: 39433, Start Num: 122
Candidate Starts for Blue7_69:
(33, 40074), (Start: 122 @39819 has 218 MA's), (158, 39684), (174, 39594), (184, 39549), (191, 39525),

Gene: Blueeyedbeauty_248 Start: 118392, Stop: 118817, Start Num: 132
Candidate Starts for Blueeyedbeauty_248:
(86, 118299), (Start: 89 @118308 has 12 MA's), (Start: 132 @118392 has 33 MA's), (153, 118494), (180, 118656), (181, 118659), (199, 118737),

Gene: Bobby_110 Start: 66483, Stop: 66869, Start Num: 122
Candidate Starts for Bobby_110:

(Start: 122 @66483 has 218 MA's), (137, 66504), (158, 66615), (174, 66705), (175, 66708), (176, 66717), (184, 66753), (191, 66777), (193, 66786), (199, 66822),

Gene: BogosyJay_69 Start: 41417, Stop: 41028, Start Num: 119
Candidate Starts for BogosyJay_69:
(12, 41864), (69, 41510), (70, 41507), (71, 41504), (Start: 119 @41417 has 24 MA's), (164, 41252), (174, 41192), (190, 41123), (191, 41120), (196, 41096), (205, 41042),

Gene: Bombitas_104 Start: 62038, Stop: 62424, Start Num: 122
Candidate Starts for Bombitas_104:
(Start: 122 @62038 has 218 MA's), (138, 62062), (148, 62086), (158, 62170), (174, 62260), (175, 62263), (176, 62272), (178, 62287), (184, 62308), (191, 62332), (193, 62341), (199, 62377),

Gene: Bonamassa_61 Start: 40354, Stop: 39965, Start Num: 122
Candidate Starts for Bonamassa_61:
(Start: 122 @40354 has 218 MA's), (158, 40216), (174, 40126), (182, 40087), (191, 40057),

Gene: Boohoo_73 Start: 40644, Stop: 40246, Start Num: 122
Candidate Starts for Boohoo_73:
(64, 40770), (66, 40767), (67, 40764), (Start: 122 @40644 has 218 MA's), (158, 40503), (166, 40455), (196, 40314),

Gene: Bowling_65 Start: 41898, Stop: 42311, Start Num: 122
Candidate Starts for Bowling_65:
(96, 41841), (Start: 104 @41865 has 5 MA's), (Start: 122 @41898 has 218 MA's), (162, 42063), (175, 42129), (208, 42297),

Gene: Bradman_70 Start: 41009, Stop: 40623, Start Num: 122
Candidate Starts for Bradman_70:
(Start: 104 @41039 has 5 MA's), (Start: 122 @41009 has 218 MA's), (158, 40874), (174, 40784), (191, 40715), (193, 40706), (205, 40637),

Gene: BronnyJames_109 Start: 60777, Stop: 61160, Start Num: 122
Candidate Starts for BronnyJames_109:
(Start: 122 @60777 has 218 MA's), (138, 60801), (158, 60909), (174, 60999), (186, 61056), (191, 61068), (205, 61146),

Gene: BrutonGaster_92 Start: 59955, Stop: 60353, Start Num: 110
Candidate Starts for BrutonGaster_92:
(Start: 110 @59955 has 2 MA's), (187, 60252), (196, 60285),

Gene: Bubble_62 Start: 43372, Stop: 43758, Start Num: 129
Candidate Starts for Bubble_62:
(Start: 129 @43372 has 8 MA's), (166, 43546), (179, 43624), (182, 43636), (189, 43660), (190, 43663), (196, 43690), (199, 43711),

Gene: Bumblebee11_61 Start: 41324, Stop: 40941, Start Num: 118
Candidate Starts for Bumblebee11_61:
(Start: 89 @41336 has 12 MA's), (Start: 118 @41324 has 14 MA's), (174, 41102), (186, 41045), (191, 41033), (196, 41009), (200, 40985),

Gene: C3PO_66 Start: 48881, Stop: 48504, Start Num: 132
Candidate Starts for C3PO_66:

(Start: 132 @48881 has 33 MA's), (156, 48764), (193, 48587), (196, 48572),

Gene: Caitlin_75 Start: 42281, Stop: 41808, Start Num: 89
Candidate Starts for Caitlin_75:
(Start: 89 @42281 has 12 MA's), (133, 42200), (141, 42167), (151, 42116), (158, 42059), (174, 41969), (191, 41900), (202, 41837),

Gene: Candra_68 Start: 39723, Stop: 39337, Start Num: 122
Candidate Starts for Candra_68:
(Start: 122 @39723 has 218 MA's), (158, 39588), (174, 39498), (178, 39474), (181, 39462), (191, 39429),

Gene: Cantare_111 Start: 82062, Stop: 82451, Start Num: 132
Candidate Starts for Cantare_111:
(Start: 132 @82062 has 33 MA's), (149, 82113), (181, 82320), (196, 82377), (203, 82419), (204, 82422),

Gene: Caraxes_68 Start: 40235, Stop: 39846, Start Num: 122
Candidate Starts for Caraxes_68:
(59, 40334), (Start: 101 @40259 has 5 MA's), (Start: 122 @40235 has 218 MA's), (151, 40154), (158, 40097), (174, 40007), (191, 39938), (199, 39893), (203, 39872),

Gene: Cassini_68 Start: 37643, Stop: 38038, Start Num: 123
Candidate Starts for Cassini_68:
(76, 37550), (Start: 123 @37643 has 33 MA's), (167, 37820), (173, 37859), (190, 37931), (196, 37958),

Gene: Catalina_72 Start: 41433, Stop: 41047, Start Num: 122
Candidate Starts for Catalina_72:
(Start: 122 @41433 has 218 MA's), (138, 41406), (140, 41397), (158, 41298), (174, 41208), (186, 41151), (191, 41139), (206, 41055),

Gene: Celestialunch_65 Start: 40447, Stop: 40058, Start Num: 116
Candidate Starts for Celestialunch_65:
(Start: 116 @40447 has 2 MA's), (164, 40282), (174, 40222), (186, 40162),

Gene: Chadwick_66 Start: 40650, Stop: 40261, Start Num: 122
Candidate Starts for Chadwick_66:
(Start: 122 @40650 has 218 MA's), (148, 40599), (158, 40512), (164, 40482), (174, 40422), (191, 40353),

Gene: Chargerpower_64 Start: 39412, Stop: 39029, Start Num: 119
Candidate Starts for Chargerpower_64:
(64, 39520), (66, 39517), (67, 39514), (Start: 119 @39412 has 24 MA's), (151, 39337), (158, 39280), (174, 39190), (191, 39121),

Gene: Charm_65 Start: 40574, Stop: 40188, Start Num: 119
Candidate Starts for Charm_65:
(27, 40850), (Start: 119 @40574 has 24 MA's), (137, 40550), (164, 40412), (174, 40352), (186, 40292),

Gene: Chartreuse_66 Start: 39039, Stop: 38653, Start Num: 122
Candidate Starts for Chartreuse_66:
(Start: 122 @39039 has 218 MA's), (158, 38904), (174, 38814), (178, 38790), (181, 38778), (191, 38745),

Gene: Che12_70 Start: 40396, Stop: 39983, Start Num: 101
Candidate Starts for Che12_70:
(59, 40471), (Start: 101 @40396 has 5 MA's), (Start: 122 @40372 has 218 MA's), (148, 40321), (151, 40291), (158, 40234), (174, 40144), (191, 40075), (199, 40030), (203, 40009), (205, 39997),

Gene: CheeseSpider_70 Start: 42769, Stop: 43164, Start Num: 121
Candidate Starts for CheeseSpider_70:
(32, 42502), (99, 42721), (Start: 121 @42769 has 17 MA's), (151, 42859), (159, 42919), (182, 43042), (186, 43060), (189, 43066), (190, 43069), (199, 43117), (205, 43150),

Gene: ChewyVIII_67 Start: 48737, Stop: 48354, Start Num: 127
Candidate Starts for ChewyVIII_67:
(Start: 127 @48737 has 1 MA's), (155, 48617), (196, 48422),

Gene: Chilliams_222 Start: 145062, Stop: 145415, Start Num: 143
Candidate Starts for Chilliams_222:
(143, 145062), (174, 145236), (186, 145296),

Gene: Cici_62 Start: 41339, Stop: 40956, Start Num: 118
Candidate Starts for Cici_62:
(Start: 89 @41351 has 12 MA's), (Start: 118 @41339 has 14 MA's), (174, 41117), (186, 41060), (191, 41048), (196, 41024), (200, 41000),

Gene: Cindaradix_59 Start: 40951, Stop: 40565, Start Num: 118
Candidate Starts for Cindaradix_59:
(Start: 89 @40963 has 12 MA's), (Start: 118 @40951 has 14 MA's), (149, 40897), (151, 40873), (174, 40726), (191, 40657), (200, 40609),

Gene: ClamChowder_81 Start: 52690, Stop: 53085, Start Num: 123
Candidate Starts for ClamChowder_81:
(16, 52267), (31, 52408), (47, 52507), (95, 52630), (Start: 123 @52690 has 33 MA's), (174, 52921), (186, 52981), (199, 53038),

Gene: CloudWang3_69 Start: 40203, Stop: 39817, Start Num: 122
Candidate Starts for CloudWang3_69:
(33, 40458), (Start: 122 @40203 has 218 MA's), (158, 40068), (174, 39978), (184, 39933), (191, 39909),

Gene: CogOmlette_66 Start: 40847, Stop: 40461, Start Num: 119
Candidate Starts for CogOmlette_66:
(69, 40952), (70, 40949), (71, 40946), (81, 40928), (Start: 119 @40847 has 24 MA's), (158, 40712), (174, 40622), (191, 40553),

Gene: Confidence_51 Start: 35894, Stop: 36283, Start Num: 123
Candidate Starts for Confidence_51:
(Start: 123 @35894 has 33 MA's), (151, 35978), (165, 36068), (182, 36161), (186, 36179), (189, 36185), (190, 36188), (196, 36215), (205, 36269),

Gene: Conquerage_68 Start: 41108, Stop: 40722, Start Num: 122
Candidate Starts for Conquerage_68:
(Start: 122 @41108 has 218 MA's), (138, 41081), (140, 41072), (158, 40973), (174, 40883), (191, 40814), (206, 40730),

Gene: Conspiracy_64 Start: 40754, Stop: 40365, Start Num: 122
Candidate Starts for Conspiracy_64:
(Start: 122 @40754 has 218 MA's), (148, 40703), (158, 40616), (174, 40526), (182, 40487), (191, 40457),

Gene: Constella_99 Start: 58878, Stop: 59264, Start Num: 122
Candidate Starts for Constella_99:
(Start: 122 @58878 has 218 MA's), (137, 58899), (158, 59010), (174, 59100), (175, 59103), (176, 59112), (184, 59148), (191, 59172), (193, 59181), (199, 59217),

Gene: Coog_60 Start: 40568, Stop: 40179, Start Num: 122
Candidate Starts for Coog_60:
(26, 40835), (Start: 122 @40568 has 218 MA's), (148, 40517), (158, 40430), (174, 40340), (182, 40301), (191, 40271),

Gene: Cookiedough_67 Start: 39667, Stop: 39281, Start Num: 122
Candidate Starts for Cookiedough_67:
(Start: 122 @39667 has 218 MA's), (158, 39532), (174, 39442), (178, 39418), (181, 39406), (191, 39373),

Gene: Courthouse_106 Start: 59891, Stop: 60274, Start Num: 122
Candidate Starts for Courthouse_106:
(Start: 122 @59891 has 218 MA's), (138, 59915), (158, 60023), (174, 60113), (186, 60170), (191, 60182),

Gene: Cozz_62 Start: 43369, Stop: 43755, Start Num: 129
Candidate Starts for Cozz_62:
(Start: 129 @43369 has 8 MA's), (166, 43543), (179, 43621), (182, 43633), (189, 43657), (190, 43660), (196, 43687), (199, 43708),

Gene: Crescenzo_74 Start: 40659, Stop: 41054, Start Num: 123
Candidate Starts for Crescenzo_74:
(Start: 123 @40659 has 33 MA's), (144, 40707),

Gene: Cruella_66 Start: 48881, Stop: 48504, Start Num: 132
Candidate Starts for Cruella_66:
(Start: 132 @48881 has 33 MA's), (156, 48764), (165, 48719), (193, 48587), (196, 48572),

Gene: Cubone_47 Start: 31139, Stop: 31525, Start Num: 128
Candidate Starts for Cubone_47:
(23, 30806), (24, 30839), (39, 30947), (42, 30959), (45, 30980), (47, 31001), (66, 31055), (83, 31094), (90, 31109), (92, 31112), (Start: 128 @31139 has 5 MA's), (151, 31217), (158, 31274), (166, 31310), (174, 31364), (182, 31403), (191, 31433), (204, 31502), (205, 31511),

Gene: Cuco_62 Start: 40428, Stop: 40039, Start Num: 122
Candidate Starts for Cuco_62:
(26, 40695), (Start: 122 @40428 has 218 MA's), (148, 40377), (158, 40290), (174, 40200), (182, 40161), (191, 40131),

Gene: D29_64 Start: 41880, Stop: 41464, Start Num: 104
Candidate Starts for D29_64:

(44, 42054), (63, 41967), (75, 41943), (Start: 104 @41880 has 5 MA's), (Start: 122 @41850 has 218 MA's), (148, 41799), (151, 41772), (158, 41715), (174, 41625), (191, 41556),

Gene: D32_68 Start: 41850, Stop: 41464, Start Num: 122
Candidate Starts for D32_68:
(44, 42054), (63, 41967), (75, 41943), (Start: 104 @41880 has 5 MA's), (Start: 122 @41850 has 218 MA's), (148, 41799), (151, 41772), (158, 41715), (174, 41625), (191, 41556),

Gene: DBQu4n_69 Start: 41830, Stop: 41444, Start Num: 122
Candidate Starts for DBQu4n_69:
(48, 41995), (63, 41947), (78, 41917), (Start: 104 @41860 has 5 MA's), (Start: 122 @41830 has 218 MA's), (148, 41779), (151, 41752), (158, 41695), (174, 41605), (191, 41536),

Gene: DaVinci_65 Start: 39093, Stop: 38707, Start Num: 122
Candidate Starts for DaVinci_65:
(Start: 122 @39093 has 218 MA's), (158, 38958), (174, 38868), (178, 38844), (181, 38832), (191, 38799),

Gene: Dallas_117 Start: 65617, Stop: 66003, Start Num: 122
Candidate Starts for Dallas_117:
(103, 65581), (Start: 122 @65617 has 218 MA's), (137, 65638), (158, 65749), (174, 65839), (175, 65842), (176, 65851), (191, 65911), (193, 65920), (199, 65956),

Gene: Danforth_76 Start: 42544, Stop: 42155, Start Num: 122
Candidate Starts for Danforth_76:
(80, 42577), (Start: 122 @42544 has 218 MA's), (143, 42499), (151, 42463), (158, 42406), (174, 42316), (191, 42247),

Gene: Darrell_71 Start: 41935, Stop: 41549, Start Num: 119
Candidate Starts for Darrell_71:
(Start: 119 @41935 has 24 MA's), (158, 41800), (174, 41710), (191, 41641),

Gene: DarthP_55 Start: 39439, Stop: 39828, Start Num: 121
Candidate Starts for DarthP_55:
(Start: 121 @39439 has 17 MA's), (138, 39466), (151, 39523), (157, 39577), (158, 39580), (174, 39664), (186, 39724), (199, 39781), (202, 39799),

Gene: DarthPhader_64 Start: 42068, Stop: 41685, Start Num: 122
Candidate Starts for DarthPhader_64:
(64, 42188), (66, 42185), (67, 42182), (Start: 122 @42068 has 218 MA's), (155, 41951), (158, 41936), (174, 41846), (191, 41777),

Gene: Darwin_67 Start: 48122, Stop: 47745, Start Num: 132
Candidate Starts for Darwin_67:
(Start: 132 @48122 has 33 MA's), (156, 48005), (165, 47960), (193, 47828), (196, 47813),

Gene: DarwinJr_76 Start: 40614, Stop: 41009, Start Num: 123
Candidate Starts for DarwinJr_76:
(Start: 123 @40614 has 33 MA's), (144, 40662),

Gene: Datway_62 Start: 41310, Stop: 40927, Start Num: 118
Candidate Starts for Datway_62:

(Start: 89 @41322 has 12 MA's), (Start: 118 @41310 has 14 MA's), (174, 41088), (186, 41031), (191, 41019), (196, 40995), (200, 40971),

Gene: DekHockey33_74 Start: 40936, Stop: 40538, Start Num: 122
Candidate Starts for DekHockey33_74:
(85, 41017), (Start: 122 @40936 has 218 MA's), (158, 40795), (166, 40747), (196, 40606),

Gene: DelvinSonDorr_64 Start: 39898, Stop: 39512, Start Num: 122
Candidate Starts for DelvinSonDorr_64:
(Start: 122 @39898 has 218 MA's), (158, 39763), (174, 39673), (178, 39649), (181, 39637), (191, 39604),

Gene: Dennebes_82 Start: 40059, Stop: 39634, Start Num: 132
Candidate Starts for Dennebes_82:
(79, 40161), (93, 40131), (99, 40119), (Start: 132 @40059 has 33 MA's), (140, 40023), (141, 40020), (151, 39969), (153, 39954), (155, 39927), (159, 39909), (165, 39879), (166, 39876), (186, 39768), (199, 39711),

Gene: Destructrice_76 Start: 39613, Stop: 39188, Start Num: 132
Candidate Starts for Destructrice_76:
(Start: 109 @39643 has 8 MA's), (Start: 132 @39613 has 33 MA's), (146, 39559), (152, 39523), (158, 39469), (159, 39466), (165, 39436), (174, 39385), (191, 39313), (199, 39268), (210, 39208),

Gene: Ding_64 Start: 37922, Stop: 38317, Start Num: 123
Candidate Starts for Ding_64:
(Start: 123 @37922 has 33 MA's),

Gene: Discoknowium_61 Start: 40271, Stop: 39882, Start Num: 122
Candidate Starts for Discoknowium_61:
(Start: 122 @40271 has 218 MA's), (148, 40220), (158, 40133), (174, 40043), (182, 40004), (191, 39974),

Gene: Dixon_75 Start: 42148, Stop: 41675, Start Num: 89
Candidate Starts for Dixon_75:
(Start: 89 @42148 has 12 MA's), (133, 42067), (141, 42034), (151, 41983), (158, 41926), (174, 41836), (191, 41767), (202, 41704),

Gene: DmpstrDiver_117 Start: 65037, Stop: 65423, Start Num: 122
Candidate Starts for DmpstrDiver_117:
(103, 65001), (Start: 122 @65037 has 218 MA's), (137, 65058), (158, 65169), (174, 65259), (175, 65262), (176, 65271), (178, 65286), (184, 65307), (191, 65331), (193, 65340), (199, 65376),

Gene: DogYard_55 Start: 39575, Stop: 39153, Start Num: 112
Candidate Starts for DogYard_55:
(67, 39671), (Start: 112 @39575 has 10 MA's), (Start: 123 @39560 has 33 MA's), (145, 39503), (148, 39500), (159, 39410), (164, 39383), (172, 39335), (191, 39257), (200, 39209), (201, 39206),

Gene: Dorothea_67 Start: 39665, Stop: 39279, Start Num: 122
Candidate Starts for Dorothea_67:
(Start: 122 @39665 has 218 MA's), (158, 39530), (174, 39440), (178, 39416), (181, 39404), (191, 39371),

Gene: Dove_102 Start: 60531, Stop: 60917, Start Num: 122

Candidate Starts for Dove_102:
(103, 60495), (Start: 122 @60531 has 218 MA's), (137, 60552), (158, 60663), (174, 60753), (175, 60756), (176, 60765), (184, 60801), (191, 60825), (193, 60834), (199, 60870),

Gene: DreamTeam1_65 Start: 40406, Stop: 40020, Start Num: 119
Candidate Starts for DreamTeam1_65:
(27, 40682), (Start: 119 @40406 has 24 MA's), (137, 40382), (164, 40244), (174, 40184), (186, 40124),

Gene: Duke13_112 Start: 62708, Stop: 63094, Start Num: 122
Candidate Starts for Duke13_112:
(103, 62672), (Start: 122 @62708 has 218 MA's), (137, 62729), (158, 62840), (174, 62930), (175, 62933), (176, 62942), (184, 62978), (191, 63002), (193, 63011), (199, 63047),

Gene: Duplo_69 Start: 41917, Stop: 41501, Start Num: 104
Candidate Starts for Duplo_69:
(48, 42052), (63, 42004), (78, 41974), (Start: 104 @41917 has 5 MA's), (Start: 122 @41887 has 218 MA's), (148, 41836), (151, 41809), (158, 41752), (174, 41662), (191, 41593),

Gene: EZMoney23_65 Start: 41540, Stop: 41157, Start Num: 122
Candidate Starts for EZMoney23_65:
(Start: 104 @41573 has 5 MA's), (Start: 122 @41540 has 218 MA's), (151, 41465), (158, 41408), (174, 41318), (178, 41294), (191, 41249),

Gene: EagleEye_70 Start: 41375, Stop: 40989, Start Num: 122
Candidate Starts for EagleEye_70:
(33, 41633), (Start: 122 @41375 has 218 MA's), (151, 41297), (158, 41240), (174, 41150), (191, 41081),

Gene: EdogawaKiddo_70 Start: 41400, Stop: 41014, Start Num: 122
Candidate Starts for EdogawaKiddo_70:
(Start: 122 @41400 has 218 MA's), (138, 41373), (140, 41364), (158, 41265), (174, 41175), (191, 41106), (206, 41022),

Gene: Eidsmoe_68 Start: 41100, Stop: 40714, Start Num: 122
Candidate Starts for Eidsmoe_68:
(Start: 122 @41100 has 218 MA's), (138, 41073), (140, 41064), (158, 40965), (174, 40875), (191, 40806), (206, 40722),

Gene: Ejimix_110 Start: 65796, Stop: 66179, Start Num: 122
Candidate Starts for Ejimix_110:
(103, 65760), (Start: 122 @65796 has 218 MA's), (137, 65817), (158, 65928), (182, 66057), (186, 66075), (191, 66087), (205, 66165),

Gene: Ekdilam_52 Start: 39075, Stop: 39458, Start Num: 123
Candidate Starts for Ekdilam_52:
(Start: 123 @39075 has 33 MA's), (138, 39102), (158, 39210), (174, 39294), (186, 39354), (202, 39429), (204, 39435),

Gene: ElTiger69_66 Start: 40898, Stop: 40509, Start Num: 122
Candidate Starts for ElTiger69_66:
(Start: 122 @40898 has 218 MA's), (148, 40847), (158, 40760), (164, 40730), (174, 40670), (191, 40601),

Gene: Elephantoon_68 Start: 40741, Stop: 40352, Start Num: 119
Candidate Starts for Elephantoon_68:
(69, 40846), (70, 40843), (71, 40840), (81, 40822), (Start: 119 @40741 has 24 MA's), (164, 40576), (174, 40516), (190, 40447), (191, 40444), (205, 40366),

Gene: Elle_67 Start: 39137, Stop: 38748, Start Num: 122
Candidate Starts for Elle_67:
(22, 39512), (28, 39434), (64, 39263), (66, 39260), (67, 39257), (77, 39239), (Start: 122 @39137 has 218 MA's), (158, 39002), (186, 38852), (196, 38816),

Gene: Ellie_51 Start: 38816, Stop: 39196, Start Num: 123
Candidate Starts for Ellie_51:
(Start: 123 @38816 has 33 MA's), (138, 38843), (148, 38867), (158, 38951), (160, 38957), (186, 39092), (196, 39128), (199, 39149), (202, 39167), (204, 39173),

Gene: Elsa_65 Start: 41909, Stop: 42322, Start Num: 122
Candidate Starts for Elsa_65:
(96, 41852), (Start: 104 @41876 has 5 MA's), (Start: 122 @41909 has 218 MA's), (155, 42038), (162, 42074), (175, 42140), (208, 42308),

Gene: Emotion_32 Start: 23912, Stop: 24310, Start Num: 123
Candidate Starts for Emotion_32:
(11, 23414), (25, 23576), (36, 23666), (47, 23732), (50, 23738), (Start: 123 @23912 has 33 MA's),

Gene: EmyBug_67 Start: 41102, Stop: 40716, Start Num: 122
Candidate Starts for EmyBug_67:
(Start: 122 @41102 has 218 MA's), (138, 41075), (140, 41066), (158, 40967), (174, 40877), (191, 40808), (206, 40724),

Gene: Epsocamisio_69 Start: 40081, Stop: 39683, Start Num: 122
Candidate Starts for Epsocamisio_69:
(Start: 122 @40081 has 218 MA's), (158, 39940), (166, 39892), (176, 39832), (196, 39751),

Gene: EricB_66 Start: 39680, Stop: 39294, Start Num: 122
Candidate Starts for EricB_66:
(Start: 122 @39680 has 218 MA's), (158, 39545), (174, 39455), (178, 39431), (181, 39419), (191, 39386),

Gene: EricMillard_109 Start: 64677, Stop: 65063, Start Num: 122
Candidate Starts for EricMillard_109:
(103, 64641), (Start: 122 @64677 has 218 MA's), (137, 64698), (158, 64809), (174, 64899), (175, 64902), (176, 64911), (178, 64926), (184, 64947), (191, 64971), (193, 64980), (199, 65016),

Gene: Estes_48 Start: 35060, Stop: 34668, Start Num: 130
Candidate Starts for Estes_48:
(39, 35303), (40, 35300), (44, 35285), (48, 35246), (53, 35225), (94, 35126), (Start: 130 @35060 has 6 MA's), (151, 34976), (174, 34829), (191, 34760), (199, 34715),

Gene: Expelliarmus_73 Start: 42362, Stop: 41880, Start Num: 89
Candidate Starts for Expelliarmus_73:
(Start: 89 @42362 has 12 MA's), (Start: 124 @42284 has 3 MA's), (151, 42188), (158, 42131), (174, 42041), (191, 41972), (202, 41909),

Gene: ExplosioNervosa_68 Start: 41168, Stop: 40782, Start Num: 122
Candidate Starts for ExplosioNervosa_68:
(Start: 122 @41168 has 218 MA's), (138, 41141), (140, 41132), (158, 41033), (174, 40943), (191, 40874), (206, 40790),

Gene: Fayely_68 Start: 41069, Stop: 40683, Start Num: 122
Candidate Starts for Fayely_68:
(Start: 122 @41069 has 218 MA's), (138, 41042), (140, 41033), (158, 40934), (174, 40844), (191, 40775), (206, 40691),

Gene: Fefferhead_53 Start: 38763, Stop: 39143, Start Num: 123
Candidate Starts for Fefferhead_53:
(Start: 123 @38763 has 33 MA's), (138, 38790), (148, 38814), (158, 38898), (160, 38904), (186, 39039), (196, 39075), (199, 39096), (202, 39114), (204, 39120),

Gene: Fenry_62 Start: 41952, Stop: 42347, Start Num: 121
Candidate Starts for Fenry_62:
(10, 41430), (21, 41580), (82, 41865), (Start: 121 @41952 has 17 MA's), (138, 41985), (159, 42102), (182, 42225), (186, 42243), (189, 42249), (190, 42252), (199, 42300), (205, 42333),

Gene: FiveHead_35 Start: 23414, Stop: 23812, Start Num: 123
Candidate Starts for FiveHead_35:
(Start: 123 @23414 has 33 MA's),

Gene: FloraSnap32_234 Start: 154158, Stop: 154580, Start Num: 109
Candidate Starts for FloraSnap32_234:
(Start: 109 @154158 has 8 MA's), (140, 154218), (151, 154263), (167, 154359), (196, 154500), (197, 154506),

Gene: Florence1_58 Start: 39866, Stop: 39477, Start Num: 122
Candidate Starts for Florence1_58:
(Start: 122 @39866 has 218 MA's), (148, 39815), (158, 39728), (174, 39638), (182, 39599), (191, 39569),

Gene: Florence4_60 Start: 39866, Stop: 39477, Start Num: 122
Candidate Starts for Florence4_60:
(Start: 122 @39866 has 218 MA's), (148, 39815), (158, 39728), (174, 39638), (182, 39599), (191, 39569),

Gene: ForDig_51 Start: 50594, Stop: 50211, Start Num: 125
Candidate Starts for ForDig_51:
(Start: 125 @50594 has 2 MA's), (152, 50516), (157, 50465), (164, 50432), (167, 50423), (169, 50399), (174, 50372), (182, 50333), (186, 50315), (191, 50303), (196, 50279),

Gene: ForGetIt_64 Start: 40779, Stop: 40390, Start Num: 122
Candidate Starts for ForGetIt_64:
(Start: 122 @40779 has 218 MA's), (148, 40728), (158, 40641), (174, 40551), (182, 40512), (191, 40482),

Gene: Forrestell_53 Start: 38219, Stop: 37797, Start Num: 112
Candidate Starts for Forrestell_53:
(90, 38273), (Start: 112 @38219 has 10 MA's), (Start: 123 @38204 has 33 MA's), (145, 38147), (148, 38144), (159, 38054), (164, 38027), (172, 37979), (191, 37901), (200, 37853), (201, 37850),

Gene: Frankie_67 Start: 42381, Stop: 42767, Start Num: 128
Candidate Starts for Frankie_67:
(35, 42174), (38, 42186), (42, 42201), (45, 42222), (47, 42243), (66, 42297), (83, 42336), (90, 42351), (92, 42354), (Start: 128 @42381 has 5 MA's), (151, 42459), (158, 42516), (166, 42552), (174, 42606), (191, 42675), (204, 42744), (205, 42753),

Gene: FrostedClock_241 Start: 156144, Stop: 156566, Start Num: 109
Candidate Starts for FrostedClock_241:
(Start: 109 @156144 has 8 MA's), (140, 156204), (167, 156345), (174, 156390), (196, 156486), (197, 156492),

Gene: Fugax_82 Start: 52682, Stop: 53077, Start Num: 123
Candidate Starts for Fugax_82:
(16, 52259), (31, 52400), (47, 52499), (95, 52622), (Start: 123 @52682 has 33 MA's), (174, 52913), (186, 52973), (199, 53030),

Gene: Funsized_63 Start: 58183, Stop: 57782, Start Num: 114
Candidate Starts for Funsized_63:
(Start: 114 @58183 has 6 MA's), (143, 58120), (152, 58090), (155, 58051), (160, 58030), (169, 57973), (174, 57943), (191, 57874), (193, 57865),

Gene: Fury_24 Start: 9277, Stop: 9669, Start Num: 121
Candidate Starts for Fury_24:
(Start: 121 @9277 has 17 MA's), (143, 9322), (147, 9334), (151, 9364), (159, 9424), (165, 9454), (166, 9457), (168, 9478), (182, 9547), (183, 9550), (186, 9565), (190, 9574), (199, 9622), (204, 9646), (205, 9655),

Gene: Gail_68 Start: 41859, Stop: 41473, Start Num: 122
Candidate Starts for Gail_68:
(64, 41985), (74, 41961), (83, 41943), (Start: 122 @41859 has 218 MA's), (151, 41781), (155, 41739), (158, 41724), (174, 41634), (182, 41595), (191, 41565),

Gene: Garak_69 Start: 40058, Stop: 39672, Start Num: 122
Candidate Starts for Garak_69:
(33, 40313), (Start: 122 @40058 has 218 MA's), (158, 39923), (174, 39833), (184, 39788), (191, 39764),

Gene: GardenSalsa_48 Start: 35170, Stop: 34781, Start Num: 130
Candidate Starts for GardenSalsa_48:
(65, 35302), (Start: 130 @35170 has 6 MA's), (151, 35083), (158, 35026), (174, 34942), (186, 34885), (191, 34873), (196, 34849), (200, 34825), (202, 34810),

Gene: Garnacho_147 Start: 82256, Stop: 82687, Start Num: 132
Candidate Starts for Garnacho_147:
(95, 82187), (105, 82214), (Start: 132 @82256 has 33 MA's), (153, 82361), (161, 82418), (165, 82436), (170, 82472), (174, 82493), (191, 82565),

Gene: GaugeLDP_63 Start: 41446, Stop: 41060, Start Num: 117
Candidate Starts for GaugeLDP_63:
(Start: 117 @41446 has 4 MA's), (151, 41368), (155, 41326), (158, 41311), (174, 41221), (182, 41182), (191, 41152),

Gene: GenevaB15_46 Start: 34794, Stop: 34402, Start Num: 130
Candidate Starts for GenevaB15_46:
(42, 35016), (48, 34974), (65, 34923), (68, 34914), (Start: 130 @34794 has 6 MA's), (151, 34710), (191, 34494), (199, 34449),

Gene: George_58 Start: 40098, Stop: 39709, Start Num: 122
Candidate Starts for George_58:
(Start: 122 @40098 has 218 MA's), (158, 39960), (174, 39870), (182, 39831), (191, 39801),

Gene: Gladiator_65 Start: 39283, Stop: 38897, Start Num: 122
Candidate Starts for Gladiator_65:
(33, 39538), (Start: 122 @39283 has 218 MA's), (158, 39148), (174, 39058), (184, 39013), (191, 38989),

Gene: GoldHunter_63 Start: 43358, Stop: 43744, Start Num: 129
Candidate Starts for GoldHunter_63:
(Start: 129 @43358 has 8 MA's), (166, 43532), (179, 43610), (182, 43622), (189, 43646), (190, 43649), (196, 43676), (199, 43697),

Gene: GoldenEssence_228 Start: 149977, Stop: 150399, Start Num: 109
Candidate Starts for GoldenEssence_228:
(Start: 109 @149977 has 8 MA's), (140, 150037), (174, 150223), (196, 150319), (197, 150325),

Gene: Gonephishing_105 Start: 59315, Stop: 59698, Start Num: 122
Candidate Starts for Gonephishing_105:
(Start: 122 @59315 has 218 MA's), (138, 59339), (158, 59447), (174, 59537), (186, 59594), (191, 59606), (205, 59684),

Gene: Groundhog_75 Start: 42567, Stop: 42085, Start Num: 89
Candidate Starts for Groundhog_75:
(Start: 89 @42567 has 12 MA's), (Start: 124 @42489 has 3 MA's), (151, 42393), (158, 42336), (174, 42246), (191, 42177),

Gene: Gruunaga_68 Start: 40016, Stop: 39630, Start Num: 122
Candidate Starts for Gruunaga_68:
(33, 40271), (Start: 122 @40016 has 218 MA's), (158, 39881), (174, 39791), (184, 39746), (191, 39722),

Gene: Halley_118 Start: 66112, Stop: 66495, Start Num: 122
Candidate Starts for Halley_118:
(103, 66076), (Start: 122 @66112 has 218 MA's), (137, 66133), (158, 66244), (182, 66373), (186, 66391), (191, 66403), (205, 66481),

Gene: Hammer_68 Start: 39623, Stop: 39237, Start Num: 122
Candidate Starts for Hammer_68:
(33, 39878), (Start: 122 @39623 has 218 MA's), (158, 39488), (174, 39398), (184, 39353), (191, 39329),

Gene: Hammy_55 Start: 39427, Stop: 39816, Start Num: 121
Candidate Starts for Hammy_55:
(Start: 121 @39427 has 17 MA's), (138, 39454), (151, 39511), (157, 39565), (158, 39568), (174, 39652), (186, 39712), (199, 39769), (202, 39787),

Gene: Hannaconda_102 Start: 58261, Stop: 58644, Start Num: 122
Candidate Starts for Hannaconda_102:
(Start: 122 @58261 has 218 MA's), (138, 58285), (158, 58393), (174, 58483), (186, 58540), (191, 58552), (205, 58630),

Gene: Hanray_70 Start: 41432, Stop: 41046, Start Num: 122
Candidate Starts for Hanray_70:
(Start: 122 @41432 has 218 MA's), (138, 41405), (140, 41396), (158, 41297), (174, 41207), (191, 41138), (206, 41054),

Gene: HaugeAnator_77 Start: 39587, Stop: 39162, Start Num: 132
Candidate Starts for HaugeAnator_77:
(Start: 132 @39587 has 33 MA's), (134, 39578), (143, 39542), (158, 39443), (159, 39440), (165, 39410), (174, 39359), (191, 39287), (198, 39254), (199, 39242),

Gene: Heisenberger_63 Start: 41118, Stop: 41531, Start Num: 122
Candidate Starts for Heisenberger_63:
(96, 41061), (98, 41064), (Start: 104 @41085 has 5 MA's), (Start: 122 @41118 has 218 MA's), (162, 41283), (175, 41349), (208, 41517),

Gene: Helmet_70 Start: 40058, Stop: 39672, Start Num: 122
Candidate Starts for Helmet_70:
(33, 40313), (Start: 122 @40058 has 218 MA's), (158, 39923), (174, 39833), (184, 39788), (191, 39764),

Gene: Herbertwm_63 Start: 41241, Stop: 40855, Start Num: 119
Candidate Starts for Herbertwm_63:
(108, 41262), (Start: 119 @41241 has 24 MA's), (158, 41106), (174, 41016), (178, 40992), (191, 40947),

Gene: Hexamo_68 Start: 39688, Stop: 39302, Start Num: 122
Candidate Starts for Hexamo_68:
(33, 39943), (Start: 122 @39688 has 218 MA's), (158, 39553), (174, 39463), (184, 39418), (191, 39394),

Gene: Hidrated_100 Start: 62553, Stop: 62939, Start Num: 122
Candidate Starts for Hidrated_100:
(Start: 122 @62553 has 218 MA's), (137, 62574), (158, 62685), (174, 62775), (175, 62778), (176, 62787), (184, 62823), (191, 62847), (193, 62856), (199, 62892),

Gene: Hive_53 Start: 39741, Stop: 39334, Start Num: 123
Candidate Starts for Hive_53:
(67, 39852), (Start: 112 @39756 has 10 MA's), (Start: 123 @39741 has 33 MA's), (145, 39684), (148, 39681), (159, 39591), (164, 39564), (172, 39516), (191, 39438), (200, 39390), (201, 39387),

Gene: HokkenD_106 Start: 63371, Stop: 63754, Start Num: 122
Candidate Starts for HokkenD_106:
(103, 63335), (Start: 122 @63371 has 218 MA's), (137, 63392), (158, 63503), (186, 63650), (191, 63662),

Gene: Holex_70 Start: 41448, Stop: 41062, Start Num: 122
Candidate Starts for Holex_70:

(Start: 122 @41448 has 218 MA's), (138, 41421), (140, 41412), (158, 41313), (174, 41223), (191, 41154), (206, 41070),

Gene: HomeFry_21 Start: 8167, Stop: 8565, Start Num: 121
Candidate Starts for HomeFry_21:
(Start: 121 @8167 has 17 MA's), (Start: 126 @8173 has 1 MA's), (135, 8191), (137, 8197), (140, 8209), (143, 8218), (147, 8230), (165, 8350), (166, 8353), (168, 8374), (189, 8467), (190, 8470), (199, 8518), (204, 8542), (205, 8551),

Gene: Hoot_62 Start: 37538, Stop: 37152, Start Num: 122
Candidate Starts for Hoot_62:
(Start: 122 @37538 has 218 MA's), (158, 37403), (174, 37313), (178, 37289), (181, 37277), (191, 37244),

Gene: HortumSL17_71 Start: 41432, Stop: 41046, Start Num: 122
Candidate Starts for HortumSL17_71:
(Start: 122 @41432 has 218 MA's), (138, 41405), (140, 41396), (158, 41297), (174, 41207), (186, 41150), (191, 41138), (206, 41054),

Gene: Hortus1_86 Start: 51617, Stop: 51204, Start Num: 120
Candidate Starts for Hortus1_86:
(Start: 120 @51617 has 7 MA's), (166, 51431), (191, 51311), (192, 51305), (196, 51287),

Gene: Hosp_049 Start: 48795, Stop: 48412, Start Num: 125
Candidate Starts for Hosp_049:
(102, 48843), (Start: 125 @48795 has 2 MA's), (152, 48717), (160, 48657), (165, 48630), (169, 48600), (174, 48573), (177, 48555), (186, 48516), (191, 48504), (196, 48480), (202, 48441),

Gene: Hughesyang_115 Start: 65568, Stop: 65951, Start Num: 122
Candidate Starts for Hughesyang_115:
(103, 65532), (Start: 122 @65568 has 218 MA's), (137, 65589), (158, 65700), (182, 65829), (186, 65847), (191, 65859), (205, 65937),

Gene: HuhtaEnerson15_61 Start: 40248, Stop: 39859, Start Num: 122
Candidate Starts for HuhtaEnerson15_61:
(Start: 122 @40248 has 218 MA's), (158, 40110), (174, 40020), (182, 39981), (191, 39951),

Gene: Hyzer_57 Start: 39859, Stop: 40248, Start Num: 123
Candidate Starts for Hyzer_57:
(Start: 123 @39859 has 33 MA's), (159, 40003), (165, 40033), (182, 40126), (186, 40144), (190, 40153), (205, 40234),

Gene: Imbriano_69 Start: 40052, Stop: 39666, Start Num: 122
Candidate Starts for Imbriano_69:
(Start: 122 @40052 has 218 MA's), (158, 39917), (174, 39827), (178, 39803), (181, 39791), (191, 39758),

Gene: Imvubu_55 Start: 53558, Stop: 53160, Start Num: 117
Candidate Starts for Imvubu_55:
(Start: 117 @53558 has 4 MA's), (152, 53468), (155, 53429), (158, 53414), (174, 53321), (185, 53270), (191, 53252), (196, 53228),

Gene: Indra_71 Start: 40059, Stop: 39673, Start Num: 122

Candidate Starts for Indra_71:
(33, 40314), (Start: 122 @40059 has 218 MA's), (158, 39924), (174, 39834), (184, 39789), (191, 39765),

Gene: IronMan_65 Start: 42406, Stop: 42020, Start Num: 119
Candidate Starts for IronMan_65:
(Start: 119 @42406 has 24 MA's), (143, 42361), (151, 42328), (158, 42271), (174, 42181), (191, 42112),

Gene: Isiphiwo_65 Start: 39219, Stop: 38833, Start Num: 122
Candidate Starts for Isiphiwo_65:
(Start: 122 @39219 has 218 MA's), (158, 39084), (174, 38994), (178, 38970), (181, 38958), (191, 38925),

Gene: Iwokeuplikedis_68 Start: 41379, Stop: 40990, Start Num: 118
Candidate Starts for Iwokeuplikedis_68:
(Start: 118 @41379 has 14 MA's), (151, 41301), (158, 41244), (174, 41154), (191, 41082),

Gene: JEGGS_63 Start: 41197, Stop: 41610, Start Num: 122
Candidate Starts for JEGGS_63:
(96, 41140), (98, 41143), (Start: 104 @41164 has 5 MA's), (Start: 122 @41197 has 218 MA's), (162, 41362), (175, 41428), (208, 41596),

Gene: JPandJE_76 Start: 39938, Stop: 39513, Start Num: 132
Candidate Starts for JPandJE_76:
(Start: 132 @39938 has 33 MA's), (134, 39929), (143, 39893), (158, 39794), (159, 39791), (165, 39761), (174, 39710), (191, 39638), (198, 39605), (199, 39593),

Gene: JSwag_72 Start: 40368, Stop: 39970, Start Num: 122
Candidate Starts for JSwag_72:
(85, 40449), (Start: 122 @40368 has 218 MA's), (158, 40227), (166, 40179), (196, 40038),

Gene: Jaan_66 Start: 42574, Stop: 42188, Start Num: 119
Candidate Starts for Jaan_66:
(Start: 119 @42574 has 24 MA's), (143, 42529), (151, 42496), (155, 42454), (158, 42439), (174, 42349), (191, 42280),

Gene: Jabiru_65 Start: 40817, Stop: 40428, Start Num: 122
Candidate Starts for Jabiru_65:
(Start: 122 @40817 has 218 MA's), (148, 40766), (158, 40679), (174, 40589), (191, 40520),

Gene: JakeTheSnake_76 Start: 41208, Stop: 41603, Start Num: 123
Candidate Starts for JakeTheSnake_76:
(Start: 123 @41208 has 33 MA's), (167, 41385), (190, 41496),

Gene: JasmineDragon_32 Start: 23314, Stop: 23712, Start Num: 123
Candidate Starts for JasmineDragon_32:
(Start: 123 @23314 has 33 MA's),

Gene: Jecs_53 Start: 35712, Stop: 36104, Start Num: 121
Candidate Starts for Jecs_53:
(43, 35502), (Start: 112 @35697 has 10 MA's), (Start: 121 @35712 has 17 MA's), (151, 35799), (152, 35802),

Gene: Jeeves_70 Start: 40857, Stop: 40468, Start Num: 122
Candidate Starts for Jeeves_70:
(66, 40965), (67, 40962), (Start: 122 @40857 has 218 MA's), (158, 40722), (165, 40689), (174, 40632), (191, 40560), (206, 40476),

Gene: Jeffabunny_68 Start: 39685, Stop: 39299, Start Num: 122
Candidate Starts for Jeffabunny_68:
(33, 39940), (Start: 122 @39685 has 218 MA's), (158, 39550), (174, 39460), (184, 39415), (191, 39391),

Gene: JewelBug_67 Start: 39959, Stop: 39573, Start Num: 122
Candidate Starts for JewelBug_67:
(Start: 122 @39959 has 218 MA's), (158, 39824), (163, 39800), (174, 39734), (184, 39689), (191, 39665),

Gene: Jiawan_70 Start: 41464, Stop: 41078, Start Num: 122
Candidate Starts for Jiawan_70:
(Start: 122 @41464 has 218 MA's), (138, 41437), (140, 41428), (158, 41329), (165, 41296), (174, 41239), (191, 41170), (206, 41086),

Gene: JohnThicc_32 Start: 23414, Stop: 23812, Start Num: 123
Candidate Starts for JohnThicc_32:
(Start: 123 @23414 has 33 MA's),

Gene: Jolie1_051 Start: 50701, Stop: 50318, Start Num: 125
Candidate Starts for Jolie1_051:
(102, 50746), (Start: 125 @50701 has 2 MA's), (152, 50623), (160, 50563), (165, 50536), (169, 50506), (174, 50479), (177, 50461), (186, 50422), (191, 50410), (196, 50386), (202, 50347),

Gene: Jordennis_66 Start: 39440, Stop: 39054, Start Num: 122
Candidate Starts for Jordennis_66:
(Start: 122 @39440 has 218 MA's), (158, 39305), (174, 39215), (178, 39191), (181, 39179), (191, 39146),

Gene: Jovo_64 Start: 41035, Stop: 40646, Start Num: 122
Candidate Starts for Jovo_64:
(Start: 122 @41035 has 218 MA's), (148, 40984), (158, 40897), (174, 40807), (182, 40768), (191, 40738),

Gene: Jsquared_71 Start: 41166, Stop: 40780, Start Num: 122
Candidate Starts for Jsquared_71:
(48, 41331), (Start: 104 @41196 has 5 MA's), (Start: 122 @41166 has 218 MA's), (158, 41031), (174, 40941), (191, 40872), (193, 40863), (205, 40794),

Gene: JuicyJay_113 Start: 67237, Stop: 67623, Start Num: 122
Candidate Starts for JuicyJay_113:
(103, 67201), (Start: 122 @67237 has 218 MA's), (137, 67258), (158, 67369), (174, 67459), (175, 67462), (176, 67471), (184, 67507), (191, 67531), (193, 67540), (199, 67576),

Gene: Kalah2_109 Start: 64903, Stop: 65289, Start Num: 122
Candidate Starts for Kalah2_109:

(103, 64867), (Start: 122 @64903 has 218 MA's), (137, 64924), (158, 65035), (174, 65125), (175, 65128), (176, 65137), (184, 65173), (191, 65197), (193, 65206), (199, 65242),

Gene: KashFlow_108 Start: 60766, Stop: 61149, Start Num: 122
Candidate Starts for KashFlow_108:
(Start: 122 @60766 has 218 MA's), (138, 60790), (158, 60898), (174, 60988), (191, 61057), (205, 61135),

Gene: Katalie136_62 Start: 41324, Stop: 40941, Start Num: 118
Candidate Starts for Katalie136_62:
(Start: 89 @41336 has 12 MA's), (Start: 118 @41324 has 14 MA's), (174, 41102), (186, 41045), (191, 41033), (196, 41009), (200, 40985),

Gene: KatherineG_73 Start: 40841, Stop: 40443, Start Num: 122
Candidate Starts for KatherineG_73:
(85, 40922), (Start: 122 @40841 has 218 MA's), (158, 40700), (166, 40652), (196, 40511),

Gene: KayaCho_50 Start: 50503, Stop: 50120, Start Num: 125
Candidate Starts for KayaCho_50:
(Start: 125 @50503 has 2 MA's), (152, 50425), (160, 50365), (165, 50338), (169, 50308), (174, 50281), (177, 50263), (186, 50224), (191, 50212), (196, 50188), (202, 50149),

Gene: Kazan_68 Start: 39693, Stop: 39307, Start Num: 122
Candidate Starts for Kazan_68:
(Start: 122 @39693 has 218 MA's), (158, 39558), (174, 39468), (178, 39444), (181, 39432), (191, 39399),

Gene: Kerberos_69 Start: 41879, Stop: 41463, Start Num: 104
Candidate Starts for Kerberos_69:
(48, 42014), (63, 41966), (78, 41936), (Start: 104 @41879 has 5 MA's), (Start: 122 @41849 has 218 MA's), (148, 41798), (151, 41771), (158, 41714), (174, 41624), (191, 41555),

Gene: Keziacharles14_67 Start: 41988, Stop: 41599, Start Num: 119
Candidate Starts for Keziacharles14_67:
(Start: 119 @41988 has 24 MA's), (142, 41946), (158, 41853), (174, 41763), (191, 41691),

Gene: Kharcho_11 Start: 3851, Stop: 4243, Start Num: 123
Candidate Starts for Kharcho_11:
(29, 3554), (30, 3557), (86, 3767), (Start: 123 @3851 has 33 MA's), (164, 4013), (168, 4040), (191, 4139), (201, 4190),

Gene: Kimchi1738_67 Start: 48857, Stop: 48480, Start Num: 132
Candidate Starts for Kimchi1738_67:
(Start: 132 @48857 has 33 MA's), (156, 48740), (165, 48695), (196, 48548),

Gene: Kinmap_67 Start: 40146, Stop: 39766, Start Num: 122
Candidate Starts for Kinmap_67:
(Start: 122 @40146 has 218 MA's), (174, 39927), (191, 39858), (199, 39813), (205, 39780),

Gene: Kipper29_67 Start: 39706, Stop: 39320, Start Num: 122
Candidate Starts for Kipper29_67:
(Start: 122 @39706 has 218 MA's), (158, 39571), (174, 39481), (178, 39457), (181, 39445), (191, 39412),

Gene: Klein_114 Start: 63260, Stop: 63646, Start Num: 122
Candidate Starts for Klein_114:
(Start: 122 @63260 has 218 MA's), (137, 63281), (158, 63392), (174, 63482), (175, 63485), (176, 63494), (184, 63530), (191, 63554), (193, 63563), (199, 63599),

Gene: Klodlith_65 Start: 40471, Stop: 40085, Start Num: 119
Candidate Starts for Klodlith_65:
(34, 40693), (69, 40564), (70, 40561), (71, 40558), (Start: 119 @40471 has 24 MA's), (137, 40447), (164, 40309), (174, 40249), (186, 40189),

Gene: Koduck_69 Start: 40602, Stop: 40216, Start Num: 122
Candidate Starts for Koduck_69:
(Start: 104 @40632 has 5 MA's), (Start: 122 @40602 has 218 MA's), (158, 40467), (165, 40434), (174, 40377), (191, 40308), (199, 40263),

Gene: Koko_70 Start: 40543, Stop: 40157, Start Num: 122
Candidate Starts for Koko_70:
(33, 40798), (Start: 122 @40543 has 218 MA's), (158, 40408), (174, 40318), (184, 40273), (191, 40249),

Gene: Kubulix_56 Start: 39523, Stop: 39101, Start Num: 112
Candidate Starts for Kubulix_56:
(Start: 112 @39523 has 10 MA's), (Start: 123 @39508 has 33 MA's), (145, 39451), (148, 39448), (159, 39358), (164, 39331), (172, 39283), (191, 39205), (200, 39157), (201, 39154),

Gene: L5_64 Start: 40755, Stop: 40369, Start Num: 122
Candidate Starts for L5_64:
(Start: 104 @40785 has 5 MA's), (Start: 122 @40755 has 218 MA's), (158, 40620), (174, 40530), (191, 40461),

Gene: LadyAstra_32 Start: 23354, Stop: 23752, Start Num: 123
Candidate Starts for LadyAstra_32:
(Start: 123 @23354 has 33 MA's),

Gene: Landor_66 Start: 42483, Stop: 42097, Start Num: 119
Candidate Starts for Landor_66:
(Start: 119 @42483 has 24 MA's), (143, 42438), (151, 42405), (155, 42363), (158, 42348), (174, 42258), (191, 42189),

Gene: LastHope_56 Start: 37963, Stop: 38349, Start Num: 126
Candidate Starts for LastHope_56:
(Start: 126 @37963 has 1 MA's), (161, 38116), (178, 38212), (182, 38227), (186, 38245), (191, 38257), (199, 38302), (204, 38326),

Gene: LastResort_71 Start: 40420, Stop: 40022, Start Num: 122
Candidate Starts for LastResort_71:
(64, 40546), (66, 40543), (67, 40540), (Start: 122 @40420 has 218 MA's), (158, 40279), (166, 40231), (196, 40090),

Gene: Lavahound_52 Start: 39719, Stop: 40105, Start Num: 123
Candidate Starts for Lavahound_52:

(Start: 123 @39719 has 33 MA's), (138, 39746), (151, 39803), (158, 39860), (184, 39989), (186, 40001), (199, 40058), (202, 40076), (204, 40082),

Gene: LeBruni_72 Start: 37710, Stop: 38102, Start Num: 132
Candidate Starts for LeBruni_72:
(81, 37602), (100, 37647), (Start: 132 @37710 has 33 MA's), (155, 37830),

Gene: Lev2_64 Start: 40667, Stop: 40278, Start Num: 122
Candidate Starts for Lev2_64:
(Start: 122 @40667 has 218 MA's), (148, 40616), (158, 40529), (174, 40439), (182, 40400), (191, 40370),

Gene: LilJank_68 Start: 43594, Stop: 43986, Start Num: 121
Candidate Starts for LilJank_68:
(Start: 118 @43591 has 14 MA's), (Start: 121 @43594 has 17 MA's), (143, 43642), (148, 43654), (151, 43681), (155, 43723), (159, 43741), (165, 43771), (167, 43777), (174, 43822), (186, 43882), (187, 43885), (189, 43888), (190, 43891), (199, 43939), (202, 43957),

Gene: LilSaint_206 Start: 105266, Stop: 105688, Start Num: 132
Candidate Starts for LilSaint_206:
(56, 105104), (62, 105122), (79, 105158), (Start: 132 @105266 has 33 MA's), (155, 105395),

Gene: LilSpotty_61 Start: 38299, Stop: 38685, Start Num: 128
Candidate Starts for LilSpotty_61:
(23, 37966), (24, 37999), (39, 38107), (42, 38119), (45, 38140), (47, 38161), (66, 38215), (83, 38254), (90, 38269), (92, 38272), (Start: 128 @38299 has 5 MA's), (151, 38377), (158, 38434), (166, 38470), (174, 38524), (191, 38593), (204, 38662),

Gene: Lilbunny_67 Start: 39689, Stop: 39303, Start Num: 122
Candidate Starts for Lilbunny_67:
(33, 39944), (Start: 122 @39689 has 218 MA's), (158, 39554), (174, 39464), (184, 39419), (191, 39395),

Gene: Lilleskat_69 Start: 41219, Stop: 40830, Start Num: 119
Candidate Starts for Lilleskat_69:
(69, 41312), (70, 41309), (71, 41306), (Start: 119 @41219 has 24 MA's), (164, 41054), (174, 40994), (190, 40925), (205, 40844),

Gene: Limpid_99 Start: 68068, Stop: 68493, Start Num: 132
Candidate Starts for Limpid_99:
(Start: 132 @68068 has 33 MA's), (144, 68113), (158, 68212),

Gene: LittleCherry_61 Start: 40118, Stop: 39729, Start Num: 122
Candidate Starts for LittleCherry_61:
(Start: 122 @40118 has 218 MA's), (158, 39980), (174, 39890), (182, 39851), (191, 39821),

Gene: LittleE_115 Start: 63882, Stop: 64265, Start Num: 122
Candidate Starts for LittleE_115:
(Start: 122 @63882 has 218 MA's), (138, 63906), (158, 64014), (174, 64104), (186, 64161), (191, 64173), (205, 64251),

Gene: LoneWolf_69 Start: 41266, Stop: 40880, Start Num: 119
Candidate Starts for LoneWolf_69:

(12, 41716), (69, 41359), (70, 41356), (71, 41353), (Start: 119 @41266 has 24 MA's), (164, 41104), (174, 41044), (186, 40984), (196, 40948), (205, 40894),

Gene: LonelyBoi_50 Start: 39411, Stop: 39800, Start Num: 123
Candidate Starts for LonelyBoi_50:
(Start: 123 @39411 has 33 MA's), (151, 39495), (159, 39555), (165, 39585), (182, 39678), (186, 39696), (189, 39702), (190, 39705), (196, 39732), (205, 39786),

Gene: Looper_72 Start: 40332, Stop: 39934, Start Num: 122
Candidate Starts for Looper_72:
(64, 40458), (66, 40455), (67, 40452), (Start: 122 @40332 has 218 MA's), (158, 40191), (166, 40143), (196, 40002),

Gene: Lucky2013_108 Start: 60332, Stop: 60715, Start Num: 122
Candidate Starts for Lucky2013_108:
(Start: 122 @60332 has 218 MA's), (138, 60356), (158, 60464), (174, 60554), (186, 60611), (191, 60623), (205, 60701),

Gene: Lucyedi_69 Start: 41571, Stop: 41185, Start Num: 122
Candidate Starts for Lucyedi_69:
(33, 41829), (Start: 122 @41571 has 218 MA's), (151, 41493), (158, 41436), (174, 41346), (191, 41277),

Gene: Mabodamaca_38 Start: 25972, Stop: 26409, Start Num: 122
Candidate Starts for Mabodamaca_38:
(20, 25582), (Start: 122 @25972 has 218 MA's), (148, 26032), (158, 26119), (174, 26230), (194, 26314), (196, 26326), (207, 26389), (208, 26392),

Gene: MajorMajor_69 Start: 41009, Stop: 40623, Start Num: 122
Candidate Starts for MajorMajor_69:
(Start: 104 @41039 has 5 MA's), (Start: 122 @41009 has 218 MA's), (158, 40874), (174, 40784), (191, 40715), (193, 40706), (205, 40637),

Gene: Maminiaina_69 Start: 41399, Stop: 41010, Start Num: 119
Candidate Starts for Maminiaina_69:
(12, 41846), (69, 41492), (70, 41489), (71, 41486), (Start: 119 @41399 has 24 MA's), (164, 41234), (174, 41174), (190, 41105), (191, 41102), (196, 41078), (205, 41024),

Gene: Manuel_75 Start: 39252, Stop: 38827, Start Num: 132
Candidate Starts for Manuel_75:
(Start: 132 @39252 has 33 MA's), (140, 39216), (141, 39213), (151, 39162), (159, 39102), (165, 39072), (166, 39069), (172, 39027), (186, 38961), (199, 38904), (205, 38871),

Gene: Marleymoo_100 Start: 62229, Stop: 62615, Start Num: 122
Candidate Starts for Marleymoo_100:
(103, 62193), (Start: 122 @62229 has 218 MA's), (137, 62250), (158, 62361), (174, 62451), (175, 62454), (176, 62463), (184, 62499), (191, 62523), (193, 62532), (199, 62568),

Gene: Marshawn_55 Start: 39223, Stop: 39612, Start Num: 116
Candidate Starts for Marshawn_55:
(Start: 116 @39223 has 2 MA's), (138, 39256), (147, 39280), (149, 39283), (151, 39307), (155, 39349), (161, 39379), (175, 39451), (182, 39490), (186, 39508), (191, 39520), (199, 39565), (202, 39583),

Gene: McFly_67 Start: 39652, Stop: 39266, Start Num: 122
Candidate Starts for McFly_67:
(Start: 122 @39652 has 218 MA's), (158, 39517), (174, 39427), (178, 39403), (181, 39391), (191, 39358),

Gene: MegTheThird_65 Start: 40446, Stop: 40057, Start Num: 116
Candidate Starts for MegTheThird_65:
(Start: 116 @40446 has 2 MA's), (164, 40281), (174, 40221), (186, 40161),

Gene: MellowYellow_53 Start: 38680, Stop: 38258, Start Num: 107
Candidate Starts for MellowYellow_53:
(87, 38734), (Start: 107 @38680 has 3 MA's), (Start: 114 @38665 has 6 MA's), (138, 38629), (139, 38626), (164, 38488), (167, 38479), (181, 38398), (199, 38320), (200, 38317),

Gene: MiaZeal_111 Start: 60963, Stop: 61346, Start Num: 122
Candidate Starts for MiaZeal_111:
(Start: 122 @60963 has 218 MA's), (138, 60987), (158, 61095), (174, 61185), (186, 61242), (191, 61254),

Gene: Midas2_60 Start: 40568, Stop: 40179, Start Num: 122
Candidate Starts for Midas2_60:
(26, 40835), (Start: 122 @40568 has 218 MA's), (148, 40517), (158, 40430), (174, 40340), (182, 40301), (191, 40271),

Gene: MidnightRain_76 Start: 39445, Stop: 39840, Start Num: 123
Candidate Starts for MidnightRain_76:
(Start: 123 @39445 has 33 MA's), (167, 39622), (190, 39733), (196, 39760),

Gene: Milcery_61 Start: 40066, Stop: 39677, Start Num: 122
Candidate Starts for Milcery_61:
(Start: 122 @40066 has 218 MA's), (158, 39928), (174, 39838), (182, 39799), (191, 39769),

Gene: Mildred21_213 Start: 103422, Stop: 103844, Start Num: 132
Candidate Starts for Mildred21_213:
(Start: 132 @103422 has 33 MA's), (158, 103566),

Gene: Mimi_239 Start: 155375, Stop: 155797, Start Num: 109
Candidate Starts for Mimi_239:
(Start: 109 @155375 has 8 MA's), (140, 155435), (167, 155576), (174, 155621), (196, 155717), (197, 155723),

Gene: MinecraftSteve_73 Start: 40656, Stop: 40258, Start Num: 122
Candidate Starts for MinecraftSteve_73:
(85, 40737), (Start: 122 @40656 has 218 MA's), (158, 40515), (166, 40467), (196, 40326),

Gene: Minerva_114 Start: 64539, Stop: 64925, Start Num: 122
Candidate Starts for Minerva_114:
(Start: 122 @64539 has 218 MA's), (137, 64560), (158, 64671), (174, 64761), (175, 64764), (176, 64773), (178, 64788), (184, 64809), (191, 64833), (193, 64842), (199, 64878),

Gene: MiniMommy_32 Start: 23315, Stop: 23713, Start Num: 123
Candidate Starts for MiniMommy_32:
(Start: 123 @23315 has 33 MA's),

Gene: Minispark_66 Start: 40844, Stop: 40458, Start Num: 119
Candidate Starts for Minispark_66:
(69, 40949), (70, 40946), (71, 40943), (81, 40925), (Start: 119 @40844 has 24 MA's), (158, 40709), (174, 40619), (191, 40550),

Gene: Minnow_53 Start: 50636, Stop: 50253, Start Num: 125
Candidate Starts for Minnow_53:
(Start: 125 @50636 has 2 MA's), (152, 50558), (160, 50498), (165, 50471), (169, 50441), (174, 50414), (177, 50396), (186, 50357), (191, 50345), (196, 50321), (202, 50282),

Gene: Miramae_61 Start: 40767, Stop: 40384, Start Num: 124
Candidate Starts for Miramae_61:
(51, 40932), (Start: 124 @40767 has 3 MA's), (148, 40719), (151, 40692), (155, 40650), (158, 40635), (174, 40545), (191, 40476),

Gene: Mireles_65 Start: 38542, Stop: 38147, Start Num: 132
Candidate Starts for Mireles_65:
(Start: 132 @38542 has 33 MA's), (150, 38485), (153, 38455), (209, 38158),

Gene: Mischief19_49 Start: 43289, Stop: 42864, Start Num: 132
Candidate Starts for Mischief19_49:
(37, 43547), (62, 43436), (105, 43334), (Start: 132 @43289 has 33 MA's), (136, 43271), (139, 43259), (145, 43238), (158, 43142), (165, 43109), (174, 43058),

Gene: Miskis_107 Start: 64917, Stop: 65321, Start Num: 113
Candidate Starts for Miskis_107:
(Start: 113 @64917 has 4 MA's), (158, 65067), (199, 65274),

Gene: Mistmere_85 Start: 49825, Stop: 49403, Start Num: 122
Candidate Starts for Mistmere_85:
(Start: 122 @49825 has 218 MA's), (134, 49807), (141, 49783), (176, 49585), (192, 49507), (196, 49489), (197, 49483), (200, 49465),

Gene: Morpher26_62 Start: 41357, Stop: 40962, Start Num: 89
Candidate Starts for Morpher26_62:
(Start: 89 @41357 has 12 MA's), (Start: 118 @41345 has 14 MA's), (174, 41123), (186, 41066), (191, 41054), (196, 41030), (200, 41006),

Gene: MrMagoo_48 Start: 35170, Stop: 34781, Start Num: 130
Candidate Starts for MrMagoo_48:
(65, 35302), (Start: 130 @35170 has 6 MA's), (151, 35083), (158, 35026), (174, 34942), (186, 34885), (191, 34873), (196, 34849), (200, 34825), (202, 34810),

Gene: Mudcat_61 Start: 42555, Stop: 42968, Start Num: 122
Candidate Starts for Mudcat_61:
(96, 42498), (98, 42501), (Start: 104 @42522 has 5 MA's), (Start: 122 @42555 has 218 MA's), (162, 42720), (175, 42786), (208, 42954),

Gene: MulchSalad_57 Start: 38224, Stop: 38610, Start Num: 128
Candidate Starts for MulchSalad_57:
(23, 37891), (24, 37924), (39, 38032), (42, 38044), (45, 38065), (47, 38086), (66, 38140), (83, 38179), (90, 38194), (92, 38197), (Start: 128 @38224 has 5 MA's), (151, 38302), (158, 38359), (166, 38395),

(174, 38449), (182, 38488), (191, 38518), (204, 38587), (205, 38596),

Gene: Mundrea_62 Start: 41338, Stop: 40952, Start Num: 118
Candidate Starts for Mundrea_62:
(Start: 89 @41350 has 12 MA's), (Start: 118 @41338 has 14 MA's), (151, 41260), (174, 41113), (191, 41044),

Gene: MunkgeeRoachy_61 Start: 42695, Stop: 43078, Start Num: 129
Candidate Starts for MunkgeeRoachy_61:
(Start: 129 @42695 has 8 MA's), (140, 42728), (166, 42866), (179, 42944), (182, 42956), (189, 42980), (190, 42983), (196, 43010), (199, 43031),

Gene: Muntaha_184 Start: 94748, Stop: 95173, Start Num: 132
Candidate Starts for Muntaha_184:
(131, 94745), (Start: 132 @94748 has 33 MA's), (158, 94892), (195, 95066), (199, 95093),

Gene: MyraDee_66 Start: 39043, Stop: 38666, Start Num: 119
Candidate Starts for MyraDee_66:
(Start: 119 @39043 has 24 MA's), (151, 38968), (155, 38926), (158, 38911), (174, 38827), (191, 38758),

Gene: Myxus_70 Start: 41432, Stop: 41046, Start Num: 122
Candidate Starts for Myxus_70:
(Start: 122 @41432 has 218 MA's), (138, 41405), (140, 41396), (158, 41297), (174, 41207), (186, 41150), (191, 41138), (206, 41054),

Gene: Naca_64 Start: 41202, Stop: 40813, Start Num: 122
Candidate Starts for Naca_64:
(Start: 122 @41202 has 218 MA's), (148, 41151), (158, 41064), (164, 41034), (174, 40974), (191, 40905),

Gene: Naji_69 Start: 41880, Stop: 41464, Start Num: 104
Candidate Starts for Naji_69:
(44, 42054), (63, 41967), (75, 41943), (Start: 104 @41880 has 5 MA's), (Start: 122 @41850 has 218 MA's), (148, 41799), (151, 41772), (158, 41715), (174, 41625), (191, 41556),

Gene: Nason_65 Start: 41909, Stop: 42322, Start Num: 122
Candidate Starts for Nason_65:
(96, 41852), (Start: 104 @41876 has 5 MA's), (Start: 122 @41909 has 218 MA's), (155, 42038), (162, 42074), (175, 42140), (208, 42308),

Gene: NearlyHeadless_76 Start: 42310, Stop: 41921, Start Num: 122
Candidate Starts for NearlyHeadless_76:
(80, 42343), (Start: 122 @42310 has 218 MA's), (151, 42229), (158, 42172), (174, 42082), (191, 42013),

Gene: Nebulosus_70 Start: 40318, Stop: 39920, Start Num: 122
Candidate Starts for Nebulosus_70:
(Start: 122 @40318 has 218 MA's), (158, 40177), (166, 40129), (176, 40069), (196, 39988),

Gene: Nedarya_68 Start: 40272, Stop: 39877, Start Num: 122
Candidate Starts for Nedarya_68:
(Start: 122 @40272 has 218 MA's), (158, 40128), (200, 39921),

Gene: Neeharika16_66 Start: 39119, Stop: 38733, Start Num: 122
Candidate Starts for Neeharika16_66:
(Start: 122 @39119 has 218 MA's), (158, 38984), (174, 38894), (178, 38870), (181, 38858), (191, 38825),

Gene: Newrala_67 Start: 39654, Stop: 39268, Start Num: 122
Candidate Starts for Newrala_67:
(Start: 122 @39654 has 218 MA's), (158, 39519), (174, 39429), (178, 39405), (181, 39393), (191, 39360),

Gene: Nibley_104 Start: 60354, Stop: 60737, Start Num: 122
Candidate Starts for Nibley_104:
(Start: 122 @60354 has 218 MA's), (138, 60378), (158, 60486), (174, 60576), (186, 60633), (191, 60645), (205, 60723),

Gene: NicoleTera_65 Start: 41824, Stop: 41441, Start Num: 122
Candidate Starts for NicoleTera_65:
(Start: 122 @41824 has 218 MA's), (151, 41749), (158, 41692), (174, 41602), (178, 41578), (191, 41533),

Gene: NihilNomen_118 Start: 65189, Stop: 65575, Start Num: 122
Candidate Starts for NihilNomen_118:
(103, 65153), (Start: 122 @65189 has 218 MA's), (137, 65210), (158, 65321), (174, 65411), (175, 65414), (176, 65423), (184, 65459), (191, 65483), (193, 65492), (199, 65528),

Gene: Nikan_57 Start: 40541, Stop: 40128, Start Num: 114
Candidate Starts for Nikan_57:
(Start: 107 @40556 has 3 MA's), (Start: 114 @40541 has 6 MA's), (138, 40505), (139, 40502), (167, 40355), (173, 40313), (188, 40244), (205, 40160),

Gene: Noelle_63 Start: 41653, Stop: 41267, Start Num: 118
Candidate Starts for Noelle_63:
(Start: 89 @41665 has 12 MA's), (Start: 118 @41653 has 14 MA's), (165, 41485), (174, 41428), (191, 41359), (196, 41335), (204, 41290),

Gene: Norvs_114 Start: 65981, Stop: 66385, Start Num: 113
Candidate Starts for Norvs_114:
(Start: 113 @65981 has 4 MA's), (158, 66131), (199, 66338),

Gene: NothingSpecial_64 Start: 42052, Stop: 41663, Start Num: 117
Candidate Starts for NothingSpecial_64:
(Start: 117 @42052 has 4 MA's), (158, 41917), (174, 41827),

Gene: November_53 Start: 39307, Stop: 39696, Start Num: 121
Candidate Starts for November_53:
(Start: 121 @39307 has 17 MA's), (138, 39334), (151, 39391), (157, 39445), (158, 39448), (174, 39532), (186, 39592), (199, 39649), (202, 39667),

Gene: Nyilah_74 Start: 38134, Stop: 38529, Start Num: 123
Candidate Starts for Nyilah_74:
(Start: 123 @38134 has 33 MA's), (144, 38182),

Gene: NyleyClemson_51 Start: 38295, Stop: 37873, Start Num: 107
Candidate Starts for NyleyClemson_51:
(87, 38349), (Start: 107 @38295 has 3 MA's), (Start: 114 @38280 has 6 MA's), (138, 38244), (139, 38241), (164, 38103), (167, 38094), (181, 38013), (199, 37935), (200, 37932),

Gene: Odette_118 Start: 65097, Stop: 65483, Start Num: 122
Candidate Starts for Odette_118:
(103, 65061), (Start: 122 @65097 has 218 MA's), (137, 65118), (158, 65229), (174, 65319), (175, 65322), (176, 65331), (178, 65346), (184, 65367), (191, 65391), (193, 65400), (199, 65436),

Gene: Odin_67 Start: 40646, Stop: 40233, Start Num: 101
Candidate Starts for Odin_67:
(Start: 101 @40646 has 5 MA's), (Start: 122 @40622 has 218 MA's), (151, 40541), (158, 40484), (174, 40394), (191, 40325), (203, 40259), (205, 40247),

Gene: Odyssey395_58 Start: 39882, Stop: 39460, Start Num: 112
Candidate Starts for Odyssey395_58:
(67, 39978), (Start: 112 @39882 has 10 MA's), (Start: 123 @39867 has 33 MA's), (145, 39810), (148, 39807), (159, 39717), (164, 39690), (172, 39642), (191, 39564), (200, 39516), (201, 39513),

Gene: Olicious_77 Start: 39590, Stop: 39165, Start Num: 132
Candidate Starts for Olicious_77:
(Start: 132 @39590 has 33 MA's), (134, 39581), (143, 39545), (158, 39446), (159, 39443), (165, 39413), (174, 39362), (191, 39290), (198, 39257), (199, 39245),

Gene: OlinDD_86 Start: 51622, Stop: 51209, Start Num: 120
Candidate Starts for OlinDD_86:
(Start: 120 @51622 has 7 MA's), (166, 51436), (191, 51316), (192, 51310), (196, 51292),

Gene: Omega_120 Start: 64897, Stop: 65280, Start Num: 122
Candidate Starts for Omega_120:
(Start: 122 @64897 has 218 MA's), (138, 64921), (158, 65029), (174, 65119), (186, 65176), (191, 65188),

Gene: OneUp_99 Start: 62464, Stop: 62868, Start Num: 110
Candidate Starts for OneUp_99:
(71, 62383), (73, 62386), (Start: 110 @62464 has 2 MA's), (187, 62767), (188, 62770), (196, 62800),

Gene: Onglai_69 Start: 39636, Stop: 39250, Start Num: 122
Candidate Starts for Onglai_69:
(Start: 122 @39636 has 218 MA's), (138, 39609), (140, 39600), (158, 39501), (174, 39411), (191, 39342), (206, 39258),

Gene: Oofda_73 Start: 40533, Stop: 40135, Start Num: 122
Candidate Starts for Oofda_73:
(64, 40659), (66, 40656), (67, 40653), (83, 40617), (Start: 122 @40533 has 218 MA's), (158, 40392), (166, 40344), (196, 40203),

Gene: Opie_54 Start: 36900, Stop: 37292, Start Num: 121
Candidate Starts for Opie_54:
(43, 36690), (Start: 112 @36885 has 10 MA's), (Start: 121 @36900 has 17 MA's), (151, 36987), (152, 36990),

Gene: Optimus_108 Start: 63211, Stop: 63597, Start Num: 122
Candidate Starts for Optimus_108:
(Start: 122 @63211 has 218 MA's), (137, 63232), (158, 63343), (174, 63433), (175, 63436), (176, 63445), (178, 63460), (184, 63481), (191, 63505), (193, 63514), (199, 63550),

Gene: Origami_32 Start: 23354, Stop: 23752, Start Num: 123
Candidate Starts for Origami_32:
(Start: 123 @23354 has 33 MA's),

Gene: Ottawa_11 Start: 3851, Stop: 4243, Start Num: 123
Candidate Starts for Ottawa_11:
(29, 3554), (30, 3557), (86, 3767), (Start: 123 @3851 has 33 MA's), (164, 4013), (168, 4040), (191, 4139), (201, 4190),

Gene: PackMan_69 Start: 41307, Stop: 40921, Start Num: 122
Candidate Starts for PackMan_69:
(Start: 122 @41307 has 218 MA's), (138, 41280), (140, 41271), (158, 41172), (174, 41082), (186, 41025), (191, 41013), (206, 40929),

Gene: PainterBoy_68 Start: 41280, Stop: 40894, Start Num: 122
Candidate Starts for PainterBoy_68:
(33, 41538), (Start: 122 @41280 has 218 MA's), (151, 41202), (158, 41145), (174, 41055), (191, 40986),

Gene: Patbob_237 Start: 155772, Stop: 156194, Start Num: 109
Candidate Starts for Patbob_237:
(Start: 109 @155772 has 8 MA's), (140, 155832), (167, 155973), (174, 156018), (196, 156114), (197, 156120),

Gene: Percastrophe_77 Start: 39522, Stop: 39097, Start Num: 132
Candidate Starts for Percastrophe_77:
(Start: 132 @39522 has 33 MA's), (134, 39513), (143, 39477), (158, 39378), (159, 39375), (165, 39345), (174, 39294), (191, 39222), (198, 39189), (199, 39177),

Gene: Perplexer_62 Start: 41333, Stop: 40938, Start Num: 89
Candidate Starts for Perplexer_62:
(Start: 89 @41333 has 12 MA's), (Start: 118 @41321 has 14 MA's), (174, 41099), (186, 41042), (191, 41030), (196, 41006), (200, 40982),

Gene: PetiteSangsue_62 Start: 41324, Stop: 40941, Start Num: 118
Candidate Starts for PetiteSangsue_62:
(Start: 89 @41336 has 12 MA's), (Start: 118 @41324 has 14 MA's), (174, 41102), (186, 41045), (191, 41033), (196, 41009), (200, 40985),

Gene: Petra_63 Start: 40723, Stop: 41118, Start Num: 121
Candidate Starts for Petra_63:
(99, 40675), (Start: 121 @40723 has 17 MA's), (159, 40873), (182, 40996), (186, 41014), (189, 41020), (190, 41023), (199, 41071), (205, 41104),

Gene: PetterN_69 Start: 40942, Stop: 40559, Start Num: 122
Candidate Starts for PetterN_69:
(Start: 122 @40942 has 218 MA's), (158, 40810), (174, 40720), (182, 40681), (191, 40651), (200, 40603),

Gene: Ph8s_70 Start: 40729, Stop: 40316, Start Num: 101
Candidate Starts for Ph8s_70:
(54, 40816), (59, 40804), (Start: 101 @40729 has 5 MA's), (Start: 122 @40705 has 218 MA's), (148, 40654), (151, 40624), (158, 40567), (174, 40477), (191, 40408), (199, 40363), (203, 40342), (205, 40330),

Gene: Phaded_64 Start: 42459, Stop: 42076, Start Num: 119
Candidate Starts for Phaded_64:
(Start: 119 @42459 has 24 MA's), (143, 42417), (151, 42384), (155, 42342), (158, 42327), (174, 42237), (191, 42168),

Gene: Phaeder_70 Start: 41307, Stop: 40921, Start Num: 122
Candidate Starts for Phaeder_70:
(Start: 122 @41307 has 218 MA's), (138, 41280), (140, 41271), (158, 41172), (174, 41082), (186, 41025), (191, 41013), (206, 40929),

Gene: Phillis_73 Start: 41561, Stop: 41172, Start Num: 122
Candidate Starts for Phillis_73:
(80, 41594), (Start: 122 @41561 has 218 MA's), (143, 41516), (151, 41480), (158, 41423), (174, 41333), (191, 41264),

Gene: Phlorence_62 Start: 40412, Stop: 40023, Start Num: 122
Candidate Starts for Phlorence_62:
(Start: 122 @40412 has 218 MA's), (148, 40361), (158, 40274), (174, 40184), (182, 40145), (191, 40115),

Gene: Phoebus_117 Start: 66879, Stop: 67262, Start Num: 122
Candidate Starts for Phoebus_117:
(103, 66843), (Start: 122 @66879 has 218 MA's), (137, 66900), (158, 67011), (174, 67101), (186, 67158), (191, 67170),

Gene: Phonnegut_70 Start: 41377, Stop: 40991, Start Num: 122
Candidate Starts for Phonnegut_70:
(Start: 122 @41377 has 218 MA's), (138, 41350), (140, 41341), (158, 41242), (174, 41152), (191, 41083), (206, 40999),

Gene: Phrampa_232 Start: 156890, Stop: 157315, Start Num: 109
Candidate Starts for Phrampa_232:
(Start: 109 @156890 has 8 MA's), (137, 156941), (140, 156950), (156, 157043), (173, 157136), (195, 157229), (197, 157241),

Gene: PhuzzTulsa_53 Start: 39645, Stop: 39238, Start Num: 123
Candidate Starts for PhuzzTulsa_53:
(67, 39756), (Start: 112 @39660 has 10 MA's), (Start: 123 @39645 has 33 MA's), (145, 39588), (148, 39585), (159, 39495), (164, 39468), (172, 39420), (191, 39342), (200, 39294), (201, 39291),

Gene: PickleBack_64 Start: 40589, Stop: 40200, Start Num: 122
Candidate Starts for PickleBack_64:
(Start: 122 @40589 has 218 MA's), (148, 40538), (158, 40451), (174, 40361), (182, 40322), (191, 40292),

Gene: Pioneer_70 Start: 41377, Stop: 40991, Start Num: 122

Candidate Starts for Pioneer_70:
(Start: 122 @41377 has 218 MA's), (138, 41350), (140, 41341), (158, 41242), (174, 41152), (191, 41083), (206, 40999),

Gene: Pioneer3_86 Start: 51420, Stop: 51007, Start Num: 120
Candidate Starts for Pioneer3_86:
(Start: 120 @51420 has 7 MA's), (166, 51234), (191, 51114), (192, 51108), (196, 51090),

Gene: Platte_85 Start: 51188, Stop: 50775, Start Num: 120
Candidate Starts for Platte_85:
(Start: 120 @51188 has 7 MA's), (151, 51095), (166, 51002), (191, 50882), (192, 50876), (196, 50858),

Gene: Pleakley_24 Start: 9277, Stop: 9669, Start Num: 121
Candidate Starts for Pleakley_24:
(Start: 121 @9277 has 17 MA's), (143, 9322), (147, 9334), (151, 9364), (159, 9424), (165, 9454), (166, 9457), (168, 9478), (182, 9547), (183, 9550), (186, 9565), (190, 9574), (199, 9622), (204, 9646), (205, 9655),

Gene: Pmask_66 Start: 39655, Stop: 39269, Start Num: 122
Candidate Starts for Pmask_66:
(Start: 122 @39655 has 218 MA's), (158, 39520), (174, 39430), (178, 39406), (181, 39394), (191, 39361),

Gene: Pointis_54 Start: 39698, Stop: 39276, Start Num: 112
Candidate Starts for Pointis_54:
(67, 39794), (Start: 112 @39698 has 10 MA's), (Start: 123 @39683 has 33 MA's), (145, 39626), (148, 39623), (159, 39533), (164, 39506), (172, 39458), (191, 39380), (200, 39332), (201, 39329),

Gene: Polyphemus_69 Start: 40040, Stop: 39654, Start Num: 122
Candidate Starts for Polyphemus_69:
(Start: 122 @40040 has 218 MA's), (158, 39905), (174, 39815), (178, 39791), (181, 39779), (191, 39746),

Gene: Pomar16_68 Start: 41890, Stop: 41504, Start Num: 122
Candidate Starts for Pomar16_68:
(48, 42055), (63, 42007), (78, 41977), (Start: 104 @41920 has 5 MA's), (Start: 122 @41890 has 218 MA's), (148, 41839), (151, 41812), (158, 41755), (174, 41665), (191, 41596),

Gene: Popstraw_52 Start: 39469, Stop: 39062, Start Num: 123
Candidate Starts for Popstraw_52:
(67, 39580), (Start: 112 @39484 has 10 MA's), (Start: 123 @39469 has 33 MA's), (145, 39412), (148, 39409), (159, 39319), (164, 39292), (172, 39244), (191, 39166), (200, 39118), (201, 39115),

Gene: Porcelain_111 Start: 61278, Stop: 61661, Start Num: 122
Candidate Starts for Porcelain_111:
(Start: 122 @61278 has 218 MA's), (138, 61302), (158, 61410), (174, 61500), (186, 61557), (191, 61569),

Gene: Pound_106 Start: 63557, Stop: 63943, Start Num: 122
Candidate Starts for Pound_106:
(Start: 122 @63557 has 218 MA's), (137, 63578), (158, 63689), (174, 63779), (175, 63782), (176, 63791), (178, 63806), (184, 63827), (191, 63851), (193, 63860), (199, 63896),

Gene: Priamo_69 Start: 39506, Stop: 39120, Start Num: 122
Candidate Starts for Priamo_69:
(Start: 122 @39506 has 218 MA's), (158, 39371), (174, 39281), (178, 39257), (181, 39245), (191, 39212),

Gene: Prinashe11_61 Start: 40127, Stop: 39738, Start Num: 122
Candidate Starts for Prinashe11_61:
(Start: 122 @40127 has 218 MA's), (148, 40076), (158, 39989), (174, 39899), (182, 39860), (191, 39830),

Gene: Priya_68 Start: 41103, Stop: 40717, Start Num: 122
Candidate Starts for Priya_68:
(Start: 122 @41103 has 218 MA's), (138, 41076), (140, 41067), (158, 40968), (174, 40878), (191, 40809), (206, 40725),

Gene: Pukovnik_64 Start: 42126, Stop: 41743, Start Num: 119
Candidate Starts for Pukovnik_64:
(Start: 119 @42126 has 24 MA's), (143, 42084), (151, 42051), (155, 42009), (158, 41994), (174, 41904), (191, 41835),

Gene: Pumpernickel_256 Start: 148805, Stop: 149215, Start Num: 120
Candidate Starts for Pumpernickel_256:
(Start: 120 @148805 has 7 MA's), (172, 149030), (174, 149036), (175, 149039), (188, 149102), (196, 149132),

Gene: Pureglobe5_57 Start: 40129, Stop: 39707, Start Num: 112
Candidate Starts for Pureglobe5_57:
(67, 40225), (Start: 112 @40129 has 10 MA's), (Start: 123 @40114 has 33 MA's), (145, 40057), (148, 40054), (159, 39964), (164, 39937), (172, 39889), (191, 39811), (200, 39763), (201, 39760),

Gene: Qobbit_68 Start: 41065, Stop: 40679, Start Num: 122
Candidate Starts for Qobbit_68:
(Start: 122 @41065 has 218 MA's), (138, 41038), (140, 41029), (158, 40930), (174, 40840), (191, 40771), (206, 40687),

Gene: Quokka_69 Start: 41009, Stop: 40623, Start Num: 122
Candidate Starts for Quokka_69:
(Start: 104 @41039 has 5 MA's), (Start: 122 @41009 has 218 MA's), (158, 40874), (174, 40784), (191, 40715), (193, 40706), (205, 40637),

Gene: RADical_64 Start: 43245, Stop: 43631, Start Num: 129
Candidate Starts for RADical_64:
(Start: 129 @43245 has 8 MA's), (166, 43419), (179, 43497), (182, 43509), (189, 43533), (190, 43536), (196, 43563), (199, 43584),

Gene: REQ2_61 Start: 40651, Stop: 41043, Start Num: 121
Candidate Starts for REQ2_61:
(58, 40510), (61, 40519), (Start: 121 @40651 has 17 MA's), (168, 40852), (179, 40909), (191, 40951), (205, 41029),

Gene: RIPWilbur_53 Start: 39014, Stop: 38592, Start Num: 112
Candidate Starts for RIPWilbur_53:

(92, 39065), (Start: 112 @39014 has 10 MA's), (Start: 123 @38999 has 33 MA's), (145, 38942), (148, 38939), (159, 38849), (164, 38822), (191, 38696), (200, 38648), (201, 38645),

Gene: Racecar_241 Start: 155754, Stop: 156176, Start Num: 109
Candidate Starts for Racecar_241:
(Start: 109 @155754 has 8 MA's), (140, 155814), (167, 155955), (174, 156000), (196, 156096), (197, 156102),

Gene: Rahalelujah_68 Start: 40859, Stop: 40473, Start Num: 119
Candidate Starts for Rahalelujah_68:
(69, 40964), (70, 40961), (71, 40958), (81, 40940), (Start: 119 @40859 has 24 MA's), (158, 40724), (174, 40634), (191, 40565),

Gene: Ranunculus_51 Start: 42678, Stop: 42268, Start Num: 114
Candidate Starts for Ranunculus_51:
(Start: 114 @42678 has 6 MA's), (138, 42642), (139, 42639), (164, 42498), (167, 42489), (181, 42408), (186, 42387), (187, 42384),

Gene: Ravana_74 Start: 41729, Stop: 41331, Start Num: 122
Candidate Starts for Ravana_74:
(64, 41855), (66, 41852), (67, 41849), (Start: 122 @41729 has 218 MA's), (158, 41588), (166, 41540), (196, 41399),

Gene: RazzB_52 Start: 38426, Stop: 38004, Start Num: 107
Candidate Starts for RazzB_52:
(87, 38480), (Start: 107 @38426 has 3 MA's), (Start: 114 @38411 has 6 MA's), (138, 38375), (139, 38372), (164, 38234), (167, 38225), (181, 38144), (199, 38066), (200, 38063),

Gene: ReMo_71 Start: 40417, Stop: 40019, Start Num: 122
Candidate Starts for ReMo_71:
(64, 40543), (66, 40540), (67, 40537), (Start: 122 @40417 has 218 MA's), (158, 40276), (166, 40228), (196, 40087),

Gene: Rearden_105 Start: 61011, Stop: 61394, Start Num: 122
Candidate Starts for Rearden_105:
(Start: 122 @61011 has 218 MA's), (138, 61035), (158, 61143), (174, 61233), (186, 61290), (191, 61302),

Gene: Redno2_108 Start: 61893, Stop: 62276, Start Num: 122
Candidate Starts for Redno2_108:
(103, 61857), (Start: 122 @61893 has 218 MA's), (137, 61914), (158, 62025), (182, 62154), (186, 62172), (191, 62184), (205, 62262),

Gene: Refuge_64 Start: 42118, Stop: 41735, Start Num: 122
Candidate Starts for Refuge_64:
(66, 42235), (67, 42232), (Start: 122 @42118 has 218 MA's), (155, 42001), (158, 41986), (174, 41896), (191, 41827), (203, 41761),

Gene: Remus_73 Start: 40408, Stop: 40010, Start Num: 122
Candidate Starts for Remus_73:
(85, 40489), (Start: 122 @40408 has 218 MA's), (158, 40267), (166, 40219), (176, 40159), (196, 40078),

Gene: Ren19_55 Start: 40067, Stop: 39654, Start Num: 114
Candidate Starts for Ren19_55:
(Start: 107 @40082 has 3 MA's), (Start: 114 @40067 has 6 MA's), (138, 40031), (139, 40028), (167, 39881), (173, 39839), (188, 39770), (205, 39686),

Gene: Rey_48 Start: 35434, Stop: 35039, Start Num: 130
Candidate Starts for Rey_48:
(Start: 130 @35434 has 6 MA's), (171, 35218), (191, 35131), (196, 35107),

Gene: Rideau_81 Start: 39950, Stop: 39525, Start Num: 132
Candidate Starts for Rideau_81:
(79, 40052), (93, 40022), (99, 40010), (Start: 132 @39950 has 33 MA's), (140, 39914), (141, 39911), (151, 39860), (153, 39845), (155, 39818), (159, 39800), (165, 39770), (166, 39767), (186, 39659), (199, 39602),

Gene: Rifter_68 Start: 39219, Stop: 38833, Start Num: 122
Candidate Starts for Rifter_68:
(33, 39474), (Start: 122 @39219 has 218 MA's), (158, 39084), (174, 38994), (184, 38949), (191, 38925),

Gene: Roary_77 Start: 42530, Stop: 42141, Start Num: 122
Candidate Starts for Roary_77:
(80, 42563), (Start: 122 @42530 has 218 MA's), (143, 42485), (151, 42449), (174, 42302), (191, 42233), (202, 42170),

Gene: Rockabye_222 Start: 143435, Stop: 143854, Start Num: 115
Candidate Starts for Rockabye_222:
(Start: 115 @143435 has 1 MA's), (143, 143495), (152, 143534), (167, 143627), (174, 143672), (196, 143768),

Gene: Roksolana_69 Start: 40053, Stop: 39667, Start Num: 122
Candidate Starts for Roksolana_69:
(33, 40308), (Start: 122 @40053 has 218 MA's), (158, 39918), (174, 39828), (184, 39783), (191, 39759),

Gene: Romero_77 Start: 39583, Stop: 39158, Start Num: 132
Candidate Starts for Romero_77:
(Start: 132 @39583 has 33 MA's), (134, 39574), (143, 39538), (158, 39439), (159, 39436), (165, 39406), (174, 39355), (191, 39283), (198, 39250), (199, 39238),

Gene: RootBeer_42 Start: 29931, Stop: 30326, Start Num: 123
Candidate Starts for RootBeer_42:
(13, 29454), (14, 29463), (Start: 123 @29931 has 33 MA's), (153, 30027), (173, 30147), (174, 30150),

Gene: Rosalind_71 Start: 40575, Stop: 40177, Start Num: 122
Candidate Starts for Rosalind_71:
(85, 40656), (Start: 122 @40575 has 218 MA's), (158, 40434), (166, 40386), (196, 40245),

Gene: RosePharie_78 Start: 39755, Stop: 39327, Start Num: 132
Candidate Starts for RosePharie_78:
(93, 39830), (97, 39821), (106, 39794), (Start: 132 @39755 has 33 MA's), (140, 39719), (151, 39665), (153, 39650), (159, 39605), (165, 39575), (172, 39530), (198, 39419), (199, 39407), (210, 39347),

Gene: RyeScarlet_70 Start: 41352, Stop: 40966, Start Num: 122
Candidate Starts for RyeScarlet_70:
(Start: 122 @41352 has 218 MA's), (138, 41325), (140, 41316), (158, 41217), (174, 41127), (191, 41058), (206, 40974),

Gene: SJReid_248 Start: 150980, Stop: 151402, Start Num: 111
Candidate Starts for SJReid_248:
(47, 150815), (55, 150842), (Start: 111 @150980 has 1 MA's), (166, 151178), (174, 151226), (197, 151328),

Gene: Sachima_70 Start: 41333, Stop: 40947, Start Num: 122
Candidate Starts for Sachima_70:
(Start: 122 @41333 has 218 MA's), (138, 41306), (140, 41297), (158, 41198), (174, 41108), (191, 41039), (206, 40955),

Gene: Saintus_71 Start: 39194, Stop: 38805, Start Num: 122
Candidate Starts for Saintus_71:
(80, 39227), (Start: 122 @39194 has 218 MA's), (143, 39149), (151, 39113), (158, 39056), (174, 38966), (191, 38897),

Gene: Samba_63 Start: 43280, Stop: 43675, Start Num: 121
Candidate Starts for Samba_63:
(10, 42755), (82, 43193), (Start: 121 @43280 has 17 MA's), (138, 43313), (159, 43430), (182, 43553), (186, 43571), (189, 43577), (190, 43580), (199, 43628), (205, 43661),

Gene: Schatzie_111 Start: 63979, Stop: 64365, Start Num: 122
Candidate Starts for Schatzie_111:
(103, 63943), (Start: 122 @63979 has 218 MA's), (137, 64000), (158, 64111), (174, 64201), (175, 64204), (176, 64213), (178, 64228), (184, 64249), (191, 64273), (193, 64282), (199, 64318),

Gene: Scherzo_69 Start: 41596, Stop: 41210, Start Num: 122
Candidate Starts for Scherzo_69:
(Start: 122 @41596 has 218 MA's), (138, 41569), (140, 41560), (158, 41461), (174, 41371), (191, 41302), (206, 41218),

Gene: Schnabeltier_52 Start: 36133, Stop: 36540, Start Num: 112
Candidate Starts for Schnabeltier_52:
(43, 35938), (Start: 112 @36133 has 10 MA's), (Start: 121 @36148 has 17 MA's), (151, 36235), (152, 36238), (196, 36472),

Gene: Scorpia_66 Start: 41007, Stop: 40618, Start Num: 122
Candidate Starts for Scorpia_66:
(Start: 122 @41007 has 218 MA's), (148, 40956), (158, 40869), (164, 40839), (174, 40779), (191, 40710),

Gene: Scruffy_7 Start: 5375, Stop: 4974, Start Num: 132
Candidate Starts for Scruffy_7:
(46, 5582), (60, 5528), (91, 5459), (Start: 132 @5375 has 33 MA's), (148, 5327), (154, 5279), (158, 5240), (175, 5150), (188, 5087), (207, 4994), (208, 4991),

Gene: Scuba_24 Start: 9364, Stop: 9756, Start Num: 121
Candidate Starts for Scuba_24:

(Start: 121 @9364 has 17 MA's), (143, 9409), (147, 9421), (151, 9451), (159, 9511), (165, 9541), (166, 9544), (168, 9565), (182, 9634), (183, 9637), (186, 9652), (190, 9661), (199, 9709), (204, 9733), (205, 9742),

Gene: Serenity_71 Start: 41233, Stop: 40847, Start Num: 122
Candidate Starts for Serenity_71:
(Start: 122 @41233 has 218 MA's), (158, 41098), (174, 41008), (176, 40996), (191, 40939), (205, 40861),

Gene: Shaboozey_109 Start: 60798, Stop: 61181, Start Num: 122
Candidate Starts for Shaboozey_109:
(Start: 122 @60798 has 218 MA's), (138, 60822), (158, 60930), (174, 61020), (186, 61077), (191, 61089), (205, 61167),

Gene: ShakeItOph_32 Start: 23314, Stop: 23712, Start Num: 123
Candidate Starts for ShakeItOph_32:
(Start: 123 @23314 has 33 MA's),

Gene: ShayRa_73 Start: 40604, Stop: 40206, Start Num: 122
Candidate Starts for ShayRa_73:
(85, 40685), (Start: 122 @40604 has 218 MA's), (158, 40463), (166, 40415), (196, 40274),

Gene: SheaKeira_64 Start: 40347, Stop: 39961, Start Num: 119
Candidate Starts for SheaKeira_64:
(69, 40440), (70, 40437), (71, 40434), (Start: 119 @40347 has 24 MA's), (137, 40323), (164, 40185), (174, 40125),

Gene: Shinji_77 Start: 51864, Stop: 52259, Start Num: 123
Candidate Starts for Shinji_77:
(6, 51171), (7, 51240), (8, 51246), (47, 51681), (95, 51804), (Start: 123 @51864 has 33 MA's), (174, 52095), (186, 52155), (196, 52191), (199, 52212),

Gene: Shygu2_62 Start: 41375, Stop: 40992, Start Num: 118
Candidate Starts for Shygu2_62:
(Start: 89 @41387 has 12 MA's), (Start: 118 @41375 has 14 MA's), (151, 41300), (153, 41285), (174, 41153), (191, 41084), (200, 41036),

Gene: SilentRX_46 Start: 38203, Stop: 37796, Start Num: 114
Candidate Starts for SilentRX_46:
(52, 38362), (Start: 114 @38203 has 6 MA's), (174, 37972), (193, 37891),

Gene: SirPhilip_55 Start: 39707, Stop: 40096, Start Num: 121
Candidate Starts for SirPhilip_55:
(Start: 121 @39707 has 17 MA's), (138, 39740), (144, 39758), (146, 39764), (158, 39848), (174, 39932), (196, 40028), (199, 40049), (202, 40067), (204, 40073),

Gene: Smeadley_76 Start: 42484, Stop: 42002, Start Num: 89
Candidate Starts for Smeadley_76:
(Start: 89 @42484 has 12 MA's), (Start: 124 @42406 has 3 MA's), (151, 42310), (158, 42253), (174, 42163), (191, 42094), (202, 42031),

Gene: SmellyB_67 Start: 39687, Stop: 39301, Start Num: 122
Candidate Starts for SmellyB_67:

(Start: 122 @39687 has 218 MA's), (158, 39552), (174, 39462), (178, 39438), (181, 39426), (191, 39393),

Gene: Socotra_64 Start: 43351, Stop: 43737, Start Num: 129
Candidate Starts for Socotra_64:
(Start: 129 @43351 has 8 MA's), (140, 43384), (166, 43525), (179, 43603), (182, 43615), (189, 43639), (190, 43642), (196, 43669), (199, 43690),

Gene: SororFago_68 Start: 42051, Stop: 41665, Start Num: 122
Candidate Starts for SororFago_68:
(64, 42168), (74, 42144), (83, 42126), (Start: 122 @42051 has 218 MA's), (151, 41973), (158, 41916), (174, 41826), (191, 41757), (199, 41712),

Gene: Soups_73 Start: 40867, Stop: 40469, Start Num: 122
Candidate Starts for Soups_73:
(64, 40993), (66, 40990), (67, 40987), (Start: 122 @40867 has 218 MA's), (158, 40726), (166, 40678), (196, 40537),

Gene: Spouty_68 Start: 41102, Stop: 40716, Start Num: 122
Candidate Starts for Spouty_68:
(Start: 122 @41102 has 218 MA's), (138, 41075), (140, 41066), (158, 40967), (174, 40877), (191, 40808), (206, 40724),

Gene: Squint_109 Start: 61082, Stop: 61465, Start Num: 122
Candidate Starts for Squint_109:
(Start: 122 @61082 has 218 MA's), (138, 61106), (158, 61214), (174, 61304), (186, 61361), (191, 61373),

Gene: StarStuff_69 Start: 41852, Stop: 41466, Start Num: 122
Candidate Starts for StarStuff_69:
(48, 42017), (63, 41969), (78, 41939), (Start: 104 @41882 has 5 MA's), (Start: 122 @41852 has 218 MA's), (148, 41801), (151, 41774), (158, 41717), (174, 41627), (191, 41558),

Gene: Starburst_63 Start: 43247, Stop: 43633, Start Num: 129
Candidate Starts for Starburst_63:
(Start: 129 @43247 has 8 MA's), (166, 43421), (179, 43499), (182, 43511), (189, 43535), (190, 43538), (196, 43565), (199, 43586),

Gene: Stasia_62 Start: 41257, Stop: 40871, Start Num: 118
Candidate Starts for Stasia_62:
(Start: 89 @41269 has 12 MA's), (Start: 118 @41257 has 14 MA's), (165, 41089), (166, 41086), (174, 41032), (191, 40963), (196, 40939), (204, 40894),

Gene: Steamy_64 Start: 40897, Stop: 40511, Start Num: 122
Candidate Starts for Steamy_64:
(Start: 122 @40897 has 218 MA's), (151, 40819), (155, 40777), (158, 40762), (164, 40732), (174, 40672), (191, 40603),

Gene: Stella_78 Start: 40191, Stop: 39766, Start Num: 132
Candidate Starts for Stella_78:
(Start: 132 @40191 has 33 MA's), (140, 40155), (141, 40152), (153, 40086), (159, 40041), (165, 40011), (186, 39900), (199, 39843), (205, 39810),

Gene: Stephig9_75 Start: 42420, Stop: 41938, Start Num: 89
Candidate Starts for Stephig9_75:
(Start: 89 @42420 has 12 MA's), (Start: 124 @42342 has 3 MA's), (151, 42246), (158, 42189), (174, 42099), (191, 42030),

Gene: Stickynote_66 Start: 48869, Stop: 48492, Start Num: 132
Candidate Starts for Stickynote_66:
(Start: 132 @48869 has 33 MA's), (156, 48752), (165, 48707), (193, 48575), (196, 48560),

Gene: Stink_61 Start: 41047, Stop: 40664, Start Num: 124
Candidate Starts for Stink_61:
(51, 41212), (Start: 124 @41047 has 3 MA's), (148, 40999), (151, 40972), (155, 40930), (158, 40915), (174, 40825), (191, 40756),

Gene: Strosahl_73 Start: 40408, Stop: 40010, Start Num: 122
Candidate Starts for Strosahl_73:
(85, 40489), (Start: 122 @40408 has 218 MA's), (158, 40267), (166, 40219), (176, 40159), (196, 40078),

Gene: SuMoo_38 Start: 24911, Stop: 25348, Start Num: 122
Candidate Starts for SuMoo_38:
(Start: 122 @24911 has 218 MA's), (148, 24971), (158, 25058), (174, 25169), (194, 25253), (196, 25265), (207, 25328), (208, 25331),

Gene: Sunhee_69 Start: 40391, Stop: 40002, Start Num: 122
Candidate Starts for Sunhee_69:
(64, 40508), (74, 40484), (83, 40466), (Start: 122 @40391 has 218 MA's), (151, 40313), (158, 40256), (174, 40166), (191, 40094), (206, 40010),

Gene: SuperAwesome_67 Start: 39692, Stop: 39306, Start Num: 122
Candidate Starts for SuperAwesome_67:
(Start: 122 @39692 has 218 MA's), (158, 39557), (174, 39467), (184, 39422), (191, 39398),

Gene: SuperCallie99_64 Start: 39539, Stop: 39153, Start Num: 122
Candidate Starts for SuperCallie99_64:
(Start: 122 @39539 has 218 MA's), (158, 39404), (174, 39314), (178, 39290), (181, 39278), (191, 39245),

Gene: Superchunk_68 Start: 40259, Stop: 39846, Start Num: 101
Candidate Starts for Superchunk_68:
(59, 40334), (Start: 101 @40259 has 5 MA's), (Start: 122 @40235 has 218 MA's), (151, 40154), (158, 40097), (174, 40007), (191, 39938), (199, 39893), (203, 39872),

Gene: Superphikiman_108 Start: 60173, Stop: 60556, Start Num: 122
Candidate Starts for Superphikiman_108:
(Start: 122 @60173 has 218 MA's), (138, 60197), (158, 60305), (174, 60395), (186, 60452), (191, 60464),

Gene: SwirlSquare_72 Start: 40983, Stop: 40594, Start Num: 122
Candidate Starts for SwirlSquare_72:
(Start: 101 @41007 has 5 MA's), (Start: 122 @40983 has 218 MA's), (151, 40902), (158, 40845), (174, 40755), (191, 40686), (199, 40641), (203, 40620), (205, 40608),

Gene: Swirley_63 Start: 40457, Stop: 40068, Start Num: 122
Candidate Starts for Swirley_63:
(Start: 122 @40457 has 218 MA's), (158, 40319), (174, 40229), (182, 40190), (191, 40160),

Gene: Switzerland_72 Start: 40743, Stop: 40345, Start Num: 122
Candidate Starts for Switzerland_72:
(85, 40824), (Start: 122 @40743 has 218 MA's), (158, 40602), (166, 40554), (196, 40413),

Gene: Tailonex_41 Start: 33659, Stop: 33261, Start Num: 132
Candidate Starts for Tailonex_41:
(Start: 112 @33689 has 10 MA's), (Start: 132 @33659 has 33 MA's), (174, 33434), (200, 33314), (206, 33278),

Gene: Talia1610_241 Start: 155784, Stop: 156206, Start Num: 109
Candidate Starts for Talia1610_241:
(Start: 109 @155784 has 8 MA's), (140, 155844), (167, 155985), (174, 156030), (196, 156126), (197, 156132),

Gene: Tandem_86 Start: 51500, Stop: 51087, Start Num: 120
Candidate Starts for Tandem_86:
(Start: 120 @51500 has 7 MA's), (166, 51314), (191, 51194), (192, 51188), (196, 51170),

Gene: TaronosaurasRx_55 Start: 35683, Stop: 36090, Start Num: 112
Candidate Starts for TaronosaurasRx_55:
(1, 34528), (2, 34906), (3, 34969), (4, 35017), (15, 35251), (17, 35272), (18, 35287), (19, 35299), (43, 35488), (Start: 112 @35683 has 10 MA's), (Start: 121 @35698 has 17 MA's), (152, 35788), (196, 36022),

Gene: Tarynearal_60 Start: 40052, Stop: 39663, Start Num: 122
Candidate Starts for Tarynearal_60:
(Start: 122 @40052 has 218 MA's), (148, 40001), (158, 39914), (174, 39824), (182, 39785), (191, 39755),

Gene: Temprado_69 Start: 40058, Stop: 39672, Start Num: 122
Candidate Starts for Temprado_69:
(33, 40313), (Start: 122 @40058 has 218 MA's), (158, 39923), (174, 39833), (184, 39788), (191, 39764),

Gene: Thibault_97 Start: 59154, Stop: 59540, Start Num: 122
Candidate Starts for Thibault_97:
(Start: 122 @59154 has 218 MA's), (137, 59175), (158, 59286), (174, 59376), (175, 59379), (176, 59388), (191, 59448), (193, 59457), (199, 59493),

Gene: ThreeRngTarjay_113 Start: 66135, Stop: 66521, Start Num: 122
Candidate Starts for ThreeRngTarjay_113:
(103, 66099), (Start: 122 @66135 has 218 MA's), (137, 66156), (158, 66267), (174, 66357), (175, 66360), (176, 66369), (184, 66405), (191, 66429), (193, 66438), (199, 66474),

Gene: Tiger_63 Start: 40333, Stop: 39944, Start Num: 122
Candidate Starts for Tiger_63:
(Start: 122 @40333 has 218 MA's), (148, 40282), (158, 40195), (174, 40105), (182, 40066), (191, 40036),

Gene: TingHuaYa_54 Start: 37825, Stop: 38211, Start Num: 126
Candidate Starts for TingHuaYa_54:
(Start: 126 @37825 has 1 MA's), (161, 37978), (178, 38074), (182, 38089), (186, 38107), (191, 38119), (199, 38164), (204, 38188),

Gene: TipsytheTRex_67 Start: 41208, Stop: 40822, Start Num: 122
Candidate Starts for TipsytheTRex_67:
(Start: 104 @41238 has 5 MA's), (Start: 122 @41208 has 218 MA's), (158, 41073), (174, 40983), (191, 40914), (193, 40905), (205, 40836),

Gene: Toaka_69 Start: 41307, Stop: 40921, Start Num: 122
Candidate Starts for Toaka_69:
(Start: 122 @41307 has 218 MA's), (158, 41172), (174, 41082), (191, 41013),

Gene: Tomathan_69 Start: 41929, Stop: 41513, Start Num: 104
Candidate Starts for Tomathan_69:
(75, 41986), (Start: 104 @41929 has 5 MA's), (Start: 122 @41899 has 218 MA's), (148, 41848), (151, 41821), (158, 41764), (174, 41674), (191, 41605),

Gene: ToneTone_65 Start: 39618, Stop: 39232, Start Num: 122
Candidate Starts for ToneTone_65:
(33, 39873), (Start: 122 @39618 has 218 MA's), (158, 39483), (174, 39393), (184, 39348), (191, 39324),

Gene: Toniann_112 Start: 65356, Stop: 65760, Start Num: 113
Candidate Starts for Toniann_112:
(Start: 113 @65356 has 4 MA's), (158, 65506), (199, 65713),

Gene: ToriToki_77 Start: 39586, Stop: 39161, Start Num: 132
Candidate Starts for ToriToki_77:
(Start: 132 @39586 has 33 MA's), (134, 39577), (143, 39541), (158, 39442), (159, 39439), (165, 39409), (174, 39358), (191, 39286), (198, 39253), (199, 39241),

Gene: Tortellini_52 Start: 38411, Stop: 38797, Start Num: 128
Candidate Starts for Tortellini_52:
(42, 38231), (45, 38252), (47, 38273), (57, 38306), (66, 38327), (83, 38366), (90, 38381), (92, 38384), (Start: 128 @38411 has 5 MA's), (139, 38441), (143, 38456), (151, 38489), (158, 38546), (166, 38582), (174, 38636), (191, 38705), (204, 38774), (205, 38783),

Gene: Travvers_68 Start: 41879, Stop: 41463, Start Num: 104
Candidate Starts for Travvers_68:
(44, 42053), (63, 41966), (75, 41942), (Start: 104 @41879 has 5 MA's), (Start: 122 @41849 has 218 MA's), (148, 41798), (151, 41771), (158, 41714), (174, 41624), (191, 41555),

Gene: Treat_77 Start: 39461, Stop: 39036, Start Num: 132
Candidate Starts for Treat_77:
(Start: 132 @39461 has 33 MA's), (134, 39452), (143, 39416), (158, 39317), (159, 39314), (165, 39284), (174, 39233), (191, 39161), (199, 39116),

Gene: Tristan_64 Start: 42296, Stop: 41913, Start Num: 119
Candidate Starts for Tristan_64:
(Start: 119 @42296 has 24 MA's), (143, 42254), (151, 42221), (155, 42179), (158, 42164), (174, 42074), (191, 42005),

Gene: Tubs_70 Start: 41307, Stop: 40921, Start Num: 122
Candidate Starts for Tubs_70:
(Start: 122 @41307 has 218 MA's), (138, 41280), (140, 41271), (158, 41172), (174, 41082), (186, 41025), (191, 41013), (206, 40929),

Gene: Tucker_68 Start: 39821, Stop: 39435, Start Num: 122
Candidate Starts for Tucker_68:
(33, 40076), (Start: 122 @39821 has 218 MA's), (158, 39686), (174, 39596), (184, 39551), (191, 39527),

Gene: Twigg_61 Start: 40105, Stop: 39716, Start Num: 122
Candidate Starts for Twigg_61:
(Start: 122 @40105 has 218 MA's), (158, 39967), (174, 39877), (182, 39838), (191, 39808),

Gene: Typhonomachy_62 Start: 43067, Stop: 43453, Start Num: 129
Candidate Starts for Typhonomachy_62:
(Start: 129 @43067 has 8 MA's), (140, 43100), (166, 43241), (179, 43319), (182, 43331), (189, 43355), (190, 43358), (196, 43385), (199, 43406),

Gene: Ugenie5_65 Start: 41595, Stop: 41209, Start Num: 122
Candidate Starts for Ugenie5_65:
(Start: 122 @41595 has 218 MA's), (138, 41568), (140, 41559), (158, 41460), (174, 41370), (191, 41301), (206, 41217),

Gene: UnionJack_65 Start: 40489, Stop: 40100, Start Num: 122
Candidate Starts for UnionJack_65:
(Start: 122 @40489 has 218 MA's), (148, 40438), (158, 40351), (174, 40261), (182, 40222), (191, 40192),

Gene: VanDeWege_80 Start: 52520, Stop: 52915, Start Num: 123
Candidate Starts for VanDeWege_80:
(42, 52313), (47, 52352), (95, 52460), (Start: 123 @52520 has 33 MA's), (174, 52751), (186, 52811), (196, 52847), (199, 52868),

Gene: Vanisoa_67 Start: 41938, Stop: 41552, Start Num: 119
Candidate Starts for Vanisoa_67:
(Start: 119 @41938 has 24 MA's), (138, 41911), (140, 41902), (158, 41803), (174, 41713), (191, 41644),

Gene: VohminGhazi_67 Start: 39688, Stop: 39302, Start Num: 122
Candidate Starts for VohminGhazi_67:
(Start: 122 @39688 has 218 MA's), (158, 39553), (174, 39463), (178, 39439), (181, 39427), (191, 39394),

Gene: VroomVroom_32 Start: 23412, Stop: 23807, Start Num: 123
Candidate Starts for VroomVroom_32:
(Start: 123 @23412 has 33 MA's), (174, 23634),

Gene: Waits_73 Start: 40640, Stop: 40242, Start Num: 122
Candidate Starts for Waits_73:
(85, 40721), (Start: 122 @40640 has 218 MA's), (158, 40499), (166, 40451), (176, 40391), (196, 40310),

Gene: Wakanda_182 Start: 94429, Stop: 94854, Start Num: 132
Candidate Starts for Wakanda_182:
(131, 94426), (Start: 132 @94429 has 33 MA's), (158, 94573), (199, 94774),

Gene: Wanda_117 Start: 63537, Stop: 63923, Start Num: 122
Candidate Starts for Wanda_117:
(Start: 122 @63537 has 218 MA's), (137, 63558), (158, 63669), (174, 63759), (175, 63762), (176, 63771), (184, 63807), (191, 63831), (193, 63840), (199, 63876),

Gene: Warrior24_74 Start: 40988, Stop: 40590, Start Num: 122
Candidate Starts for Warrior24_74:
(64, 41114), (66, 41111), (67, 41108), (83, 41072), (Start: 122 @40988 has 218 MA's), (158, 40847), (166, 40799), (196, 40658),

Gene: Weasels2_222 Start: 111777, Stop: 112169, Start Num: 122
Candidate Starts for Weasels2_222:
(Start: 122 @111777 has 218 MA's), (206, 112161),

Gene: Wiks_67 Start: 39689, Stop: 39303, Start Num: 122
Candidate Starts for Wiks_67:
(33, 39944), (Start: 122 @39689 has 218 MA's), (158, 39554), (174, 39464), (184, 39419), (191, 39395),

Gene: Wile_62 Start: 41367, Stop: 40972, Start Num: 89
Candidate Starts for Wile_62:
(Start: 89 @41367 has 12 MA's), (Start: 118 @41355 has 14 MA's), (174, 41133), (186, 41076), (191, 41064), (196, 41040), (200, 41016),

Gene: WorldCup_66 Start: 40853, Stop: 40467, Start Num: 119
Candidate Starts for WorldCup_66:
(69, 40958), (70, 40955), (71, 40952), (81, 40934), (Start: 119 @40853 has 24 MA's), (158, 40718), (174, 40628), (191, 40559),

Gene: Wrigley_57 Start: 38811, Stop: 39200, Start Num: 123
Candidate Starts for Wrigley_57:
(49, 38643), (Start: 123 @38811 has 33 MA's), (151, 38895), (159, 38955), (182, 39078), (186, 39096), (189, 39102), (190, 39105), (205, 39186),

Gene: WunderPhul_68 Start: 39687, Stop: 39301, Start Num: 122
Candidate Starts for WunderPhul_68:
(33, 39942), (Start: 122 @39687 has 218 MA's), (158, 39552), (174, 39462), (184, 39417), (191, 39393),

Gene: Xena_61 Start: 41333, Stop: 40938, Start Num: 89
Candidate Starts for Xena_61:
(Start: 89 @41333 has 12 MA's), (Start: 118 @41321 has 14 MA's), (174, 41099), (186, 41042), (191, 41030), (196, 41006), (200, 40982),

Gene: Xenomorph_61 Start: 41580, Stop: 41993, Start Num: 122
Candidate Starts for Xenomorph_61:
(96, 41523), (Start: 104 @41547 has 5 MA's), (Start: 122 @41580 has 218 MA's), (155, 41709), (162, 41745), (175, 41811), (208, 41979),

Gene: Xiaokay_105 Start: 62064, Stop: 62450, Start Num: 122
Candidate Starts for Xiaokay_105:
(Start: 122 @62064 has 218 MA's), (137, 62085), (158, 62196), (174, 62286), (175, 62289), (176, 62298), (184, 62334), (191, 62358), (193, 62367), (199, 62403),

Gene: Yeet_107 Start: 62917, Stop: 63303, Start Num: 122
Candidate Starts for Yeet_107:
(Start: 122 @62917 has 218 MA's), (138, 62941), (148, 62965), (158, 63049), (174, 63139), (175, 63142), (176, 63151), (178, 63166), (184, 63187), (191, 63211), (193, 63220), (199, 63256),

Gene: Yeezy_49 Start: 35466, Stop: 35855, Start Num: 123
Candidate Starts for Yeezy_49:
(Start: 123 @35466 has 33 MA's), (151, 35550), (153, 35565), (159, 35610), (165, 35640), (182, 35733), (186, 35751), (189, 35757), (190, 35760), (205, 35841),

Gene: Yokurt_67 Start: 39689, Stop: 39303, Start Num: 122
Candidate Starts for Yokurt_67:
(33, 39944), (Start: 122 @39689 has 218 MA's), (158, 39554), (174, 39464), (184, 39419), (191, 39395),

Gene: ZAYM_53 Start: 35447, Stop: 35839, Start Num: 121
Candidate Starts for ZAYM_53:
(5, 34775), (9, 34901), (15, 35000), (17, 35021), (18, 35036), (19, 35048), (26, 35126), (43, 35237), (Start: 112 @35432 has 10 MA's), (Start: 121 @35447 has 17 MA's), (151, 35534), (152, 35537), (196, 35771),

Gene: Zaka_68 Start: 39689, Stop: 39303, Start Num: 122
Candidate Starts for Zaka_68:
(33, 39944), (Start: 122 @39689 has 218 MA's), (158, 39554), (174, 39464), (184, 39419), (191, 39395),

Gene: Zarbodnamra_63 Start: 40466, Stop: 40861, Start Num: 121
Candidate Starts for Zarbodnamra_63:
(10, 39941), (82, 40379), (Start: 121 @40466 has 17 MA's), (138, 40499), (159, 40616), (182, 40739), (186, 40757), (189, 40763), (190, 40766), (199, 40814), (205, 40847),

Gene: Zelink_112 Start: 66082, Stop: 66468, Start Num: 122
Candidate Starts for Zelink_112:
(103, 66046), (Start: 122 @66082 has 218 MA's), (137, 66103), (158, 66214), (174, 66304), (175, 66307), (176, 66316), (184, 66352), (191, 66376), (193, 66385), (199, 66421),

Gene: Zimmer_64 Start: 41818, Stop: 41435, Start Num: 122
Candidate Starts for Zimmer_64:
(66, 41935), (67, 41932), (Start: 122 @41818 has 218 MA's), (155, 41701), (158, 41686), (174, 41596), (191, 41527),

Gene: ZooBear_77 Start: 39587, Stop: 39162, Start Num: 132
Candidate Starts for ZooBear_77:
(Start: 132 @39587 has 33 MA's), (134, 39578), (143, 39542), (158, 39443), (159, 39440), (165, 39410), (174, 39359), (191, 39287), (198, 39254), (199, 39242),

Gene: Zulu_69 Start: 40067, Stop: 39681, Start Num: 122

Candidate Starts for Zulu_69:
(33, 40322), (Start: 122 @40067 has 218 MA's), (158, 39932), (174, 39842), (184, 39797), (191, 39773),