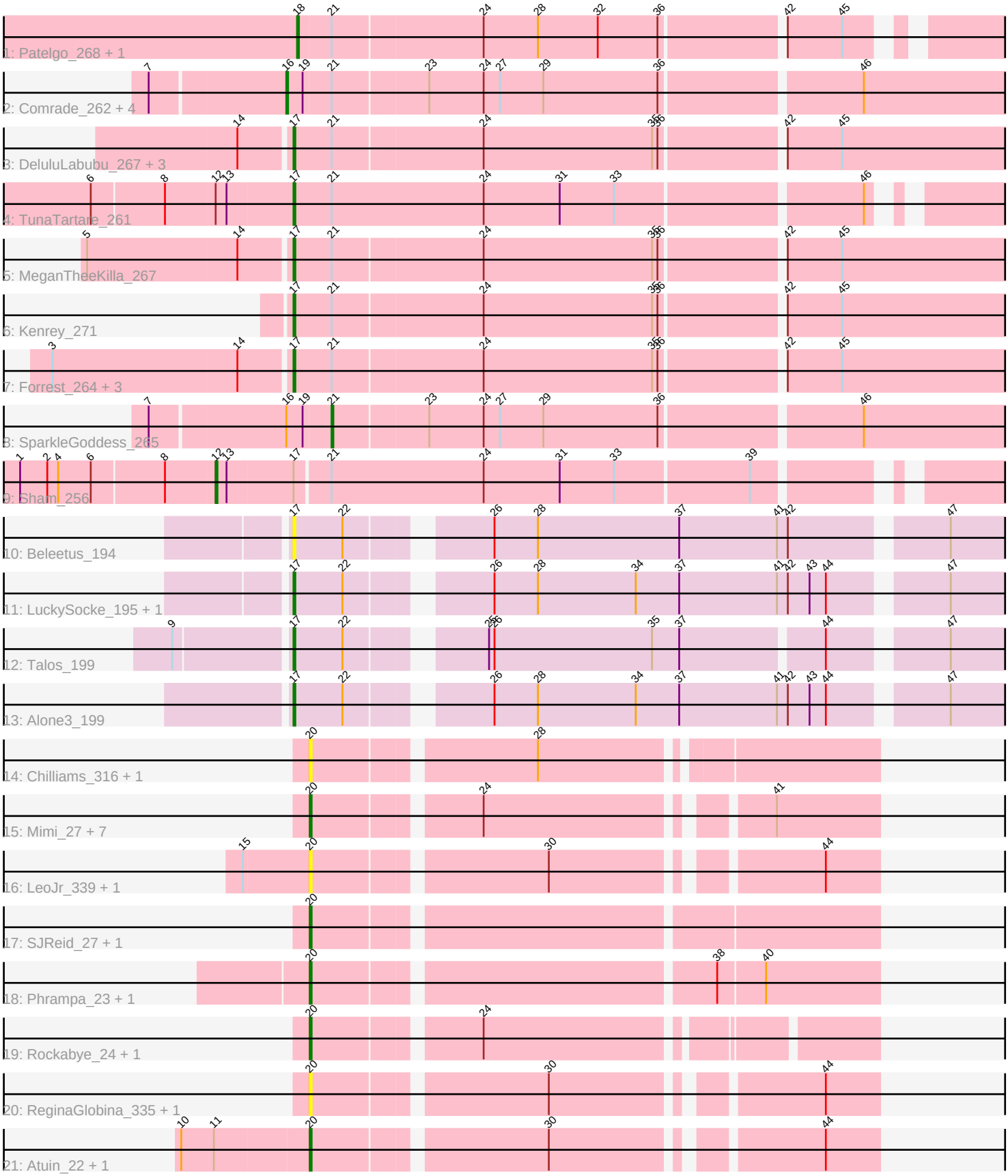
Pham 345851


1: Patelgo_268 + 1
2: Comrade_262 + 4
3: DeluluLababu_267 + 3
4: TunaTartare_261
5: MeganTheeKilla_267
6: Kenrey_271
7: Forrest_264 + 3
8: SparkleGoddess_265
9: Shami_256
10: Beleetus_194
11: LuckySocke_195 + 1
12: Talos_199
13: Alone3_199
14: Chilliams_316 + 1
15: Mimi_27 + 7
16: LeoJr_339 + 1
17: SJReid_27 + 1
18: Phrampa_23 + 1
19: Rockabye_24 + 1
20: ReginaGlobina_335 + 1
21: Atuin_22 + 1

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 345851 Report

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

Pham number 345851 has 47 members, 8 are drafts.

Phages represented in each track:
• Track 1 : Patelgo_268, Moab_265
• Track 2 : Comrade_262, Belfort_267, Karp_267, Stigma_264, Westy_268
• Track 3 : DeluluLabubu_267, Gilson_265, Maupel_271, Francob_268
• Track 4 : TunaTartare_261
• Track 5 : MeganTheeKilla_267
• Track 6 : Kenrey_271
• Track 7 : Forrest_264, Jada_265, Emma1919_266, Phredrick_271
• Track 8 : SparkleGoddess_265
• Track 9 : Sham_256
• Track 10 : Beleetus_194
• Track 11 : LuckySocke_195, Fudan_194
• Track 12 : Talos_199
• Track 13 : Alone3_199
• Track 14 : Chilliams_316, Chilliams_25
• Track 15 : Mimi_27, FrostedClock_26, Talia1610_313, FrostedClock_309, Racecar_28, Racecar_317, Talia1610_27, Mimi_312
• Track 16 : LeoJr_339, LeoJr_26
• Track 17 : SJReid_27, SJReid_336
• Track 18 : Phrampa_23, Phrampa_307
• Track 19 : Rockabye_24, Rockabye_321
• Track 20 : ReginaGlobina_335, ReginaGlobina_24
• Track 21 : Atuin_22, Atuin_322

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

The start number called the most often in the published annotations is 20, it was called in 16 of the 39 non-draft genes in the pham.

Genes that call this "Most Annotated" start:
• Atuin_22, Atuin_322, Chilliams_25, Chilliams_316, FrostedClock_26, FrostedClock_309, LeoJr_26, LeoJr_339, Mimi_27, Mimi_312, Phrampa_23, Phrampa_307, Racecar_28, Racecar_317, ReginaGlobina_24, ReginaGlobina_335, Rockabye_24, Rockabye_321, SJReid_27, SJReid_336, Talia1610_27, Talia1610_313,

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

Genes that do not have the "Most Annotated" start:
• Alone3_199, Beleetus_194, Belfort_267, Comrade_262, DeluluLabubu_267, Emma1919_266, Forrest_264, Francob_268, Fudan_194, Gilson_265, Jada_265, Karp_267, Kenrey_271, LuckySocke_195, Maupel_271, MeganTheeKilla_267, Moab_265, Patelgo_268, Phredrick_271, Sham_256, SparkleGoddess_265, Stigma_264, Talos_199, TunaTartare_261, Westy_268,

Summary by start number:

Start 12:
• Found in 2 of 47 (4.3%) of genes in pham
• Manual Annotations of this start: 1 of 39
• Called 50.0% of time when present
• Phage (with cluster) where this start called: Sham_256 (BK1),

Start 16:
• Found in 6 of 47 (12.8%) of genes in pham
• Manual Annotations of this start: 5 of 39
• Called 83.3% of time when present
• Phage (with cluster) where this start called: Belfort_267 (BK1), Comrade_262 (BK1), Karp_267 (BK1), Stigma_264 (BK1), Westy_268 (BK1),

Start 17:
• Found in 17 of 47 (36.2%) of genes in pham
• Manual Annotations of this start: 14 of 39
• Called 94.1% of time when present
• Phage (with cluster) where this start called: Alone3_199 (BS), Beleetus_194 (BS), DeluluLabubu_267 (BK1), Emma1919_266 (BK1), Forrest_264 (BK1), Francob_268 (BK1), Fudan_194 (BS), Gilson_265 (BK1), Jada_265 (BK1), Kenrey_271 (BK1), LuckySocke_195 (BS), Maupel_271 (BK1), MeganTheeKilla_267 (BK1), Phredrick_271 (BK1), Talos_199 (BS), TunaTartare_261 (BK1),

Start 18:
• Found in 2 of 47 (4.3%) of genes in pham
• Manual Annotations of this start: 2 of 39
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Moab_265 (BK1), Patelgo_268 (BK1),

Start 20:
• Found in 22 of 47 (46.8%) of genes in pham
• Manual Annotations of this start: 16 of 39
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Atuin_22 (FC), Atuin_322 (FC), Chilliams_25 (FC), Chilliams_316 (FC), FrostedClock_26 (FC), FrostedClock_309 (FC), LeoJr_26 (FC), LeoJr_339 (FC), Mimi_27 (FC), Mimi_312 (FC), Phrampa_23 (FC), Phrampa_307 (FC), Racecar_28 (FC), Racecar_317 (FC), ReginaGlobina_24 (FC), ReginaGlobina_335 (FC), Rockabye_24 (FC), Rockabye_321 (FC), SJReid_27 (FC), SJReid_336 (FC), Talia1610_27 (FC), Talia1610_313 (FC),

Start 21:
• Found in 20 of 47 (42.6%) of genes in pham
• Manual Annotations of this start: 1 of 39
• Called 5.0% of time when present
• Phage (with cluster) where this start called: SparkleGoddess_265 (BK1),

Summary by clusters:

There are 3 clusters represented in this pham: FC, BK1, BS,

Info for manual annotations of cluster BK1:
•Start number 12 was manually annotated 1 time for cluster BK1.
•Start number 16 was manually annotated 5 times for cluster BK1.
•Start number 17 was manually annotated 10 times for cluster BK1.
•Start number 18 was manually annotated 2 times for cluster BK1.
•Start number 21 was manually annotated 1 time for cluster BK1.

Info for manual annotations of cluster BS:
•Start number 17 was manually annotated 4 times for cluster BS.

Info for manual annotations of cluster FC:
•Start number 20 was manually annotated 16 times for cluster FC.

Gene Information:

Gene: Alone3_199 Start: 103287, Stop: 103649, Start Num: 17
Candidate Starts for Alone3_199:
(Start: 17 @103287 has 14 MA's), (22, 103314), (26, 103380), (28, 103404), (34, 103458), (37, 103482), (41, 103536), (42, 103542), (43, 103554), (44, 103563), (47, 103620),

Gene: Atuin_22 Start: 10912, Stop: 11193, Start Num: 20
Candidate Starts for Atuin_22:
(10, 10843), (11, 10861), (Start: 20 @10912 has 16 MA's), (30, 11032), (44, 11164),

Gene: Atuin_322 Start: 187800, Stop: 188081, Start Num: 20
Candidate Starts for Atuin_322:
(10, 187731), (11, 187749), (Start: 20 @187800 has 16 MA's), (30, 187920), (44, 188052),

Gene: Beleetus_194 Start: 101184, Stop: 101546, Start Num: 17
Candidate Starts for Beleetus_194:
(Start: 17 @101184 has 14 MA's), (22, 101211), (26, 101277), (28, 101301), (37, 101379), (41, 101433), (42, 101439), (47, 101517),

Gene: Belfort_267 Start: 127179, Stop: 127565, Start Num: 16
Candidate Starts for Belfort_267:
(7, 127107), (Start: 16 @127179 has 5 MA's), (19, 127188), (Start: 21 @127203 has 1 MA's), (23, 127254), (24, 127284), (27, 127293), (29, 127317), (36, 127380), (46, 127485),

Gene: Chilliams_316 Start: 184931, Stop: 185218, Start Num: 20
Candidate Starts for Chilliams_316:
(Start: 20 @184931 has 16 MA's), (28, 185045),

Gene: Chilliams_25 Start: 12197, Stop: 12484, Start Num: 20
Candidate Starts for Chilliams_25:
(Start: 20 @12197 has 16 MA's), (28, 12311),

Gene: Comrade_262 Start: 127318, Stop: 127704, Start Num: 16
Candidate Starts for Comrade_262:
(7, 127246), (Start: 16 @127318 has 5 MA's), (19, 127327), (Start: 21 @127342 has 1 MA's), (23, 127393), (24, 127423), (27, 127432), (29, 127456), (36, 127519), (46, 127624),

Gene: DeluluLabubu_267 Start: 126862, Stop: 127242, Start Num: 17
Candidate Starts for DeluluLabubu_267:
(14, 126835), (Start: 17 @126862 has 14 MA's), (Start: 21 @126883 has 1 MA's), (24, 126964), (35, 127057), (36, 127060), (42, 127123), (45, 127153),

Gene: Emma1919_266 Start: 126331, Stop: 126711, Start Num: 17
Candidate Starts for Emma1919_266:
(3, 126205), (14, 126304), (Start: 17 @126331 has 14 MA's), (Start: 21 @126352 has 1 MA's), (24, 126433), (35, 126526), (36, 126529), (42, 126592), (45, 126622),

Gene: Forrest_264 Start: 126768, Stop: 127148, Start Num: 17
Candidate Starts for Forrest_264:
(3, 126642), (14, 126741), (Start: 17 @126768 has 14 MA's), (Start: 21 @126789 has 1 MA's), (24, 126870), (35, 126963), (36, 126966), (42, 127029), (45, 127059),

Gene: Francob_268 Start: 127056, Stop: 127436, Start Num: 17
Candidate Starts for Francob_268:
(14, 127029), (Start: 17 @127056 has 14 MA's), (Start: 21 @127077 has 1 MA's), (24, 127158), (35, 127251), (36, 127254), (42, 127317), (45, 127347),

Gene: FrostedClock_26 Start: 12400, Stop: 12681, Start Num: 20
Candidate Starts for FrostedClock_26:
(Start: 20 @12400 has 16 MA's), (24, 12484), (41, 12625),

Gene: FrostedClock_309 Start: 186200, Stop: 186481, Start Num: 20
Candidate Starts for FrostedClock_309:
(Start: 20 @186200 has 16 MA's), (24, 186284), (41, 186425),

Gene: Fudan_194 Start: 101090, Stop: 101452, Start Num: 17
Candidate Starts for Fudan_194:
(Start: 17 @101090 has 14 MA's), (22, 101117), (26, 101183), (28, 101207), (34, 101261), (37, 101285), (41, 101339), (42, 101345), (43, 101357), (44, 101366), (47, 101423),

Gene: Gilson_265 Start: 126593, Stop: 126973, Start Num: 17
Candidate Starts for Gilson_265:
(14, 126566), (Start: 17 @126593 has 14 MA's), (Start: 21 @126614 has 1 MA's), (24, 126695), (35, 126788), (36, 126791), (42, 126854), (45, 126884),

Gene: Jada_265 Start: 126008, Stop: 126388, Start Num: 17
Candidate Starts for Jada_265:
(3, 125882), (14, 125981), (Start: 17 @126008 has 14 MA's), (Start: 21 @126029 has 1 MA's), (24, 126110), (35, 126203), (36, 126206), (42, 126269), (45, 126299),

Gene: Karp_267 Start: 128776, Stop: 129162, Start Num: 16
Candidate Starts for Karp_267:
(7, 128704), (Start: 16 @128776 has 5 MA's), (19, 128785), (Start: 21 @128800 has 1 MA's), (23, 128851), (24, 128881), (27, 128890), (29, 128914), (36, 128977), (46, 129082),

Gene: Kenrey_271 Start: 127809, Stop: 128189, Start Num: 17
Candidate Starts for Kenrey_271:
(Start: 17 @127809 has 14 MA's), (Start: 21 @127830 has 1 MA's), (24, 127911), (35, 128004), (36, 128007), (42, 128070), (45, 128100),

Gene: LeoJr_339 Start: 188518, Stop: 188799, Start Num: 20
Candidate Starts for LeoJr_339:
(15, 188482), (Start: 20 @188518 has 16 MA's), (30, 188638), (44, 188770),

Gene: LeoJr_26 Start: 11215, Stop: 11496, Start Num: 20
Candidate Starts for LeoJr_26:
(15, 11179), (Start: 20 @11215 has 16 MA's), (30, 11335), (44, 11467),

Gene: LuckySocke_195 Start: 101031, Stop: 101393, Start Num: 17
Candidate Starts for LuckySocke_195:
(Start: 17 @101031 has 14 MA's), (22, 101058), (26, 101124), (28, 101148), (34, 101202), (37, 101226), (41, 101280), (42, 101286), (43, 101298), (44, 101307), (47, 101364),

Gene: Maupel_271 Start: 125786, Stop: 126166, Start Num: 17
Candidate Starts for Maupel_271:
(14, 125759), (Start: 17 @125786 has 14 MA's), (Start: 21 @125807 has 1 MA's), (24, 125888), (35, 125981), (36, 125984), (42, 126047), (45, 126077),

Gene: MeganTheeKilla_267 Start: 126407, Stop: 126787, Start Num: 17
Candidate Starts for MeganTheeKilla_267:
(5, 126299), (14, 126380), (Start: 17 @126407 has 14 MA's), (Start: 21 @126428 has 1 MA's), (24, 126509), (35, 126602), (36, 126605), (42, 126668), (45, 126698),

Gene: Mimi_27 Start: 12295, Stop: 12576, Start Num: 20
Candidate Starts for Mimi_27:
(Start: 20 @12295 has 16 MA's), (24, 12379), (41, 12520),

Gene: Mimi_312 Start: 184955, Stop: 185236, Start Num: 20
Candidate Starts for Mimi_312:
(Start: 20 @184955 has 16 MA's), (24, 185039), (41, 185180),

Gene: Moab_265 Start: 127438, Stop: 127803, Start Num: 18
Candidate Starts for Moab_265:
(Start: 18 @127438 has 2 MA's), (Start: 21 @127456 has 1 MA's), (24, 127537), (28, 127567), (32, 127600), (36, 127633), (42, 127696), (45, 127726),

Gene: Patelgo_268 Start: 128371, Stop: 128736, Start Num: 18
Candidate Starts for Patelgo_268:
(Start: 18 @128371 has 2 MA's), (Start: 21 @128389 has 1 MA's), (24, 128470), (28, 128500), (32, 128533), (36, 128566), (42, 128629), (45, 128659),

Gene: Phrampa_23 Start: 10699, Stop: 10992, Start Num: 20
Candidate Starts for Phrampa_23:

(Start: 20 @10699 has 16 MA's), (38, 10906), (40, 10930),

Gene: Phrampa_307 Start: 187070, Stop: 187363, Start Num: 20
Candidate Starts for Phrampa_307:
(Start: 20 @187070 has 16 MA's), (38, 187277), (40, 187301),

Gene: Phredrick_271 Start: 127129, Stop: 127509, Start Num: 17
Candidate Starts for Phredrick_271:
(3, 127003), (14, 127102), (Start: 17 @127129 has 14 MA's), (Start: 21 @127150 has 1 MA's), (24, 127231), (35, 127324), (36, 127327), (42, 127390), (45, 127420),

Gene: Racecar_28 Start: 12886, Stop: 13167, Start Num: 20
Candidate Starts for Racecar_28:
(Start: 20 @12886 has 16 MA's), (24, 12970), (41, 13111),

Gene: Racecar_317 Start: 186595, Stop: 186876, Start Num: 20
Candidate Starts for Racecar_317:
(Start: 20 @186595 has 16 MA's), (24, 186679), (41, 186820),

Gene: ReginaGlobina_335 Start: 188818, Stop: 189099, Start Num: 20
Candidate Starts for ReginaGlobina_335:
(Start: 20 @188818 has 16 MA's), (30, 188938), (44, 189070),

Gene: ReginaGlobina_24 Start: 11371, Stop: 11652, Start Num: 20
Candidate Starts for ReginaGlobina_24:
(Start: 20 @11371 has 16 MA's), (30, 11491), (44, 11623),

Gene: Rockabye_24 Start: 11983, Stop: 12264, Start Num: 20
Candidate Starts for Rockabye_24:
(Start: 20 @11983 has 16 MA's), (24, 12067),

Gene: Rockabye_321 Start: 184596, Stop: 184877, Start Num: 20
Candidate Starts for Rockabye_321:
(Start: 20 @184596 has 16 MA's), (24, 184680),

Gene: SJReid_27 Start: 12400, Stop: 12693, Start Num: 20
Candidate Starts for SJReid_27:
(Start: 20 @12400 has 16 MA's),

Gene: SJReid_336 Start: 185239, Stop: 185532, Start Num: 20
Candidate Starts for SJReid_336:
(Start: 20 @185239 has 16 MA's),

Gene: Sham_256 Start: 127487, Stop: 127888, Start Num: 12
Candidate Starts for Sham_256:
(1, 127382), (2, 127397), (4, 127403), (6, 127421), (8, 127460), (Start: 12 @127487 has 1 MA's), (13, 127493), (Start: 17 @127529 has 14 MA's), (Start: 21 @127547 has 1 MA's), (24, 127631), (31, 127673), (33, 127703), (39, 127775),

Gene: SparkleGoddess_265 Start: 128069, Stop: 128431, Start Num: 21
Candidate Starts for SparkleGoddess_265:
(7, 127973), (Start: 16 @128045 has 5 MA's), (19, 128054), (Start: 21 @128069 has 1 MA's), (23, 128120), (24, 128150), (27, 128159), (29, 128183), (36, 128246), (46, 128351),

Gene: Stigma_264 Start: 127758, Stop: 128144, Start Num: 16
Candidate Starts for Stigma_264:
(7, 127686), (Start: 16 @127758 has 5 MA's), (19, 127767), (Start: 21 @127782 has 1 MA's), (23, 127833), (24, 127863), (27, 127872), (29, 127896), (36, 127959), (46, 128064),

Gene: Talia1610_313 Start: 186780, Stop: 187061, Start Num: 20
Candidate Starts for Talia1610_313:
(Start: 20 @186780 has 16 MA's), (24, 186864), (41, 187005),

Gene: Talia1610_27 Start: 12308, Stop: 12589, Start Num: 20
Candidate Starts for Talia1610_27:
(Start: 20 @12308 has 16 MA's), (24, 12392), (41, 12533),

Gene: Talos_199 Start: 101808, Stop: 102164, Start Num: 17
Candidate Starts for Talos_199:
(9, 101748), (Start: 17 @101808 has 14 MA's), (22, 101835), (25, 101898), (26, 101901), (35, 101988), (37, 102003), (44, 102078), (47, 102135),

Gene: TunaTartare_261 Start: 128151, Stop: 128513, Start Num: 17
Candidate Starts for TunaTartare_261:
(6, 128043), (8, 128082), (Start: 12 @128109 has 1 MA's), (13, 128115), (Start: 17 @128151 has 14 MA's), (Start: 21 @128172 has 1 MA's), (24, 128256), (31, 128298), (33, 128328), (46, 128457),

Gene: Westy_268 Start: 128582, Stop: 128968, Start Num: 16
Candidate Starts for Westy_268:
(7, 128510), (Start: 16 @128582 has 5 MA's), (19, 128591), (Start: 21 @128606 has 1 MA's), (23, 128657), (24, 128687), (27, 128696), (29, 128720), (36, 128783), (46, 128888),