

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 311710 Report

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

Pham number 311710 has 49 members, 10 are drafts.

Phages represented in each track:

- Track 1 : Namago_92, DonaldDuck_90, Zagie_92, Sillytadpoles_91, EverythinBagel_88, SallyK_92, Zhafia_93, Teehee_91, Jehoshaphat_92, Llemily_90
- Track 2 : BabyDotz_88
- Track 3 : Statler_93
- Track 4 : Judebell_90
- Track 5 : Rowlf_87
- Track 6 : Altheas_94
- Track 7 : Lonelysoil_88, Rudy_88, Mashley_89
- Track 8 : Mentos_94
- Track 9 : Gazebo_89, AluminumJesus_87
- Track 10 : Wheelie_90, Wayne3_92, Phabia_90
- Track 11 : MorillMayhem_90, BaconCheese_94, Mila11_92
- Track 12 : Nike_88
- Track 13 : Tissue_92
- Track 14 : Blab_87
- Track 15 : Quammi_89, Viceroy_88
- Track 16 : Phinky_96
- Track 17 : Casend_91, FrankDeliGuy_88
- Track 18 : StrawberryJamm_96
- Track 19 : Grassboy_95, Kyva_95
- Track 20 : WheelerS25_94
- Track 21 : Fizzles_89
- Track 22 : Hyperion_89
- Track 23 : Squash_93
- Track 24 : SlySloth_93
- Track 25 : LeoJr_330, LeoJr_17
- Track 26 : ReginaGlobina_15, ReginaGlobina_326
- Track 27 : Atuin_14
- Track 28 : Atuin_314

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

The start number called the most often in the published annotations is 11, it was called in 35 of the 39 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Altheas_94, AluminumJesus_87, BabyDotz_88, BaconCheese_94, Blab_87, Casend_91, DonaldDuck_90, EverythinBagel_88, FrankDeliGuy_88, Gazebo_89, Grassboy_95, Hyperion_89, Jehoshaphat_92, Judebell_90, Kyva_95, Llemily_90, Lonelysoil_88, Mashley_89, Mentos_94, Mila11_92, MorillMayhem_90, Namago_92, Nike_88, Phabia_90, Quammi_89, Rowlf_87, Rudy_88, SallyK_92, Sillytadpoles_91, SlySloth_93, Squash_93, Statler_93, StrawberryJamm_96, Teehee_91, Tissue_92, Viceroy_88, Wayne3_92, Wheelie_90, Zagie_92, Zhafia_93,

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

- Atuin_14, Atuin_314, LeoJr_17, LeoJr_330, ReginaGlobina_15, ReginaGlobina_326, WheelerS25_94,

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

- Fizzles_89, Phinky_96,

Summary by start number:

Start 4:

- Found in 4 of 49 (8.2%) of genes in pham
- Manual Annotations of this start: 1 of 39
- Called 25.0% of time when present
- Phage (with cluster) where this start called: Atuin_314 (FC),

Start 7:

- Found in 9 of 49 (18.4%) of genes in pham
- Manual Annotations of this start: 1 of 39
- Called 55.6% of time when present
- Phage (with cluster) where this start called: Atuin_14 (FC), LeoJr_17 (FC), LeoJr_330 (FC), ReginaGlobina_15 (FC), ReginaGlobina_326 (FC),

Start 9:

- Found in 5 of 49 (10.2%) of genes in pham
- No Manual Annotations of this start.
- Called 20.0% of time when present
- Phage (with cluster) where this start called: WheelerS25_94 (EG),

Start 11:

- Found in 47 of 49 (95.9%) of genes in pham
- Manual Annotations of this start: 35 of 39
- Called 85.1% of time when present
- Phage (with cluster) where this start called: Altheas_94 (EG), AluminumJesus_87 (EG), BabyDotz_88 (EG), BaconCheese_94 (EG), Blab_87 (EG), Casend_91 (EG), DonaldDuck_90 (EG), EverythinBagel_88 (EG), FrankDeliGuy_88 (EG), Gazebo_89 (EG), Grassboy_95 (EG), Hyperion_89 (EG), Jehoshaphat_92 (EG), Judebell_90 (EG), Kyva_95 (EG), Llemily_90 (EG), Lonelysoil_88 (EG), Mashley_89 (EG), Mentos_94 (EG), Mila11_92 (EG), MorillMayhem_90 (EG), Namago_92 (EG), Nike_88 (EG), Phabia_90 (EG), Quammi_89 (EG), Rowlf_87 (EG), Rudy_88 (EG), SallyK_92 (EG), Sillytadpoles_91 (EG), SlySloth_93 (EG), Squash_93 (EG), Statler_93 (EG), StrawberryJamm_96 (EG), Teehee_91 (EG), Tissue_92 (EG), Viceroy_88 (EG), Wayne3_92 (EG), Wheelie_90 (EG), Zagie_92 (EG), Zhafia_93 (EG),

Start 12:

- Found in 2 of 49 (4.1%) 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: Fizzles_89 (EG), Phinky_96 (EG),

Summary by clusters:

There are 2 clusters represented in this pham: EG, FC,

Info for manual annotations of cluster EG:

- Start number 11 was manually annotated 35 times for cluster EG.
- Start number 12 was manually annotated 2 times for cluster EG.

Info for manual annotations of cluster FC:

- Start number 4 was manually annotated 1 time for cluster FC.
- Start number 7 was manually annotated 1 time for cluster FC.

Gene Information:

Gene: Altheas_94 Start: 57562, Stop: 57122, Start Num: 11

Candidate Starts for Altheas_94:

(1, 57712), (Start: 7 @57604 has 1 MA's), (Start: 11 @57562 has 35 MA's), (15, 57499), (17, 57493), (21, 57406), (23, 57370), (27, 57358), (29, 57337), (32, 57292),

Gene: AluminumJesus_87 Start: 55760, Stop: 55278, Start Num: 11

Candidate Starts for AluminumJesus_87:

(Start: 11 @55760 has 35 MA's), (16, 55694), (23, 55565), (27, 55553), (29, 55532), (31, 55490), (33, 55442), (34, 55391),

Gene: Atuin_14 Start: 7507, Stop: 8061, Start Num: 7

Candidate Starts for Atuin_14:

(Start: 4 @7444 has 1 MA's), (Start: 7 @7507 has 1 MA's), (10, 7549), (Start: 11 @7552 has 35 MA's), (18, 7636), (22, 7720), (23, 7762), (30, 7807), (35, 7966),

Gene: Atuin_314 Start: 184332, Stop: 184949, Start Num: 4

Candidate Starts for Atuin_314:

(Start: 4 @184332 has 1 MA's), (Start: 7 @184395 has 1 MA's), (10, 184437), (Start: 11 @184440 has 35 MA's), (18, 184524), (22, 184608), (23, 184650), (30, 184695), (35, 184854),

Gene: BabyDotz_88 Start: 57483, Stop: 57007, Start Num: 11

Candidate Starts for BabyDotz_88:

(9, 57510), (Start: 11 @57483 has 35 MA's), (15, 57423), (16, 57417), (20, 57348), (25, 57288), (32, 57216), (33, 57171), (34, 57120), (35, 57096), (36, 57018),

Gene: BaconCheese_94 Start: 57968, Stop: 57531, Start Num: 11

Candidate Starts for BaconCheese_94:

(1, 58112), (Start: 11 @57968 has 35 MA's), (15, 57908), (16, 57902), (23, 57779), (29, 57746), (32, 57701), (34, 57605), (36, 57542),

Gene: Blab_87 Start: 56414, Stop: 55932, Start Num: 11

Candidate Starts for Blab_87:

(9, 56441), (Start: 11 @56414 has 35 MA's), (16, 56348), (23, 56219), (27, 56207), (29, 56186), (31, 56144), (33, 56096), (34, 56045),

Gene: Casend_91 Start: 56962, Stop: 56534, Start Num: 11

Candidate Starts for Casend_91:

(Start: 11 @56962 has 35 MA's), (15, 56902), (16, 56896), (18, 56884), (19, 56878), (21, 56803), (26, 56770), (28, 56761), (29, 56749), (31, 56707), (33, 56659),

Gene: DonaldDuck_90 Start: 56362, Stop: 55886, Start Num: 11

Candidate Starts for DonaldDuck_90:

(Start: 11 @56362 has 35 MA's), (16, 56296), (20, 56227), (25, 56167), (32, 56095), (33, 56050), (34, 55999), (35, 55975),

Gene: EverythinBagel_88 Start: 56157, Stop: 55681, Start Num: 11

Candidate Starts for EverythinBagel_88:

(Start: 11 @56157 has 35 MA's), (16, 56091), (20, 56022), (25, 55962), (32, 55890), (33, 55845), (34, 55794), (35, 55770),

Gene: Fizzles_89 Start: 56470, Stop: 56033, Start Num: 12

Candidate Starts for Fizzles_89:

(2, 56605), (Start: 12 @56470 has 2 MA's), (13, 56464), (15, 56410), (16, 56404), (23, 56281), (29, 56248), (33, 56158), (35, 56086),

Gene: FrankDeliGuy_88 Start: 56640, Stop: 56212, Start Num: 11

Candidate Starts for FrankDeliGuy_88:

(Start: 11 @56640 has 35 MA's), (15, 56580), (16, 56574), (18, 56562), (19, 56556), (21, 56481), (26, 56448), (28, 56439), (29, 56427), (31, 56385), (33, 56337),

Gene: Gazebo_89 Start: 56338, Stop: 55856, Start Num: 11

Candidate Starts for Gazebo_89:

(Start: 11 @56338 has 35 MA's), (16, 56272), (23, 56143), (27, 56131), (29, 56110), (31, 56068), (33, 56020), (34, 55969),

Gene: Grassboy_95 Start: 57263, Stop: 56781, Start Num: 11

Candidate Starts for Grassboy_95:

(Start: 11 @57263 has 35 MA's), (16, 57197), (23, 57068), (29, 57035), (31, 56993), (33, 56945), (34, 56894), (35, 56870),

Gene: Hyperion_89 Start: 56400, Stop: 55975, Start Num: 11

Candidate Starts for Hyperion_89:

(Start: 11 @56400 has 35 MA's), (15, 56340), (16, 56334), (21, 56244), (26, 56211), (31, 56148), (33, 56100),

Gene: Jehoshaphat_92 Start: 56996, Stop: 56520, Start Num: 11

Candidate Starts for Jehoshaphat_92:

(Start: 11 @56996 has 35 MA's), (16, 56930), (20, 56861), (25, 56801), (32, 56729), (33, 56684), (34, 56633), (35, 56609),

Gene: Judebell_90 Start: 56394, Stop: 55966, Start Num: 11

Candidate Starts for Judebell_90:

(Start: 11 @56394 has 35 MA's), (16, 56328), (18, 56316), (19, 56310), (21, 56235), (26, 56202), (31, 56139), (33, 56091),

Gene: Kyva_95 Start: 57287, Stop: 56805, Start Num: 11

Candidate Starts for Kyva_95:

(Start: 11 @57287 has 35 MA's), (16, 57221), (23, 57092), (29, 57059), (31, 57017), (33, 56969), (34, 56918), (35, 56894),

Gene: LeoJr_330 Start: 185111, Stop: 185665, Start Num: 7

Candidate Starts for LeoJr_330:

(Start: 7 @185111 has 1 MA's), (10, 185153), (Start: 11 @185156 has 35 MA's), (18, 185240), (22, 185324), (23, 185366), (30, 185411), (35, 185570),

Gene: LeoJr_17 Start: 7808, Stop: 8362, Start Num: 7

Candidate Starts for LeoJr_17:

(Start: 7 @7808 has 1 MA's), (10, 7850), (Start: 11 @7853 has 35 MA's), (18, 7937), (22, 8021), (23, 8063), (30, 8108), (35, 8267),

Gene: Llemily_90 Start: 56057, Stop: 55581, Start Num: 11

Candidate Starts for Llemily_90:

(Start: 11 @56057 has 35 MA's), (16, 55991), (20, 55922), (25, 55862), (32, 55790), (33, 55745), (34, 55694), (35, 55670),

Gene: Lonelysoil_88 Start: 55817, Stop: 55335, Start Num: 11

Candidate Starts for Lonelysoil_88:

(Start: 11 @55817 has 35 MA's), (15, 55757), (16, 55751), (23, 55622), (27, 55610), (29, 55589), (31, 55547), (33, 55499), (34, 55448),

Gene: Mashley_89 Start: 56489, Stop: 56007, Start Num: 11

Candidate Starts for Mashley_89:

(Start: 11 @56489 has 35 MA's), (15, 56429), (16, 56423), (23, 56294), (27, 56282), (29, 56261), (31, 56219), (33, 56171), (34, 56120),

Gene: Mentos_94 Start: 57451, Stop: 56975, Start Num: 11

Candidate Starts for Mentos_94:

(Start: 11 @57451 has 35 MA's), (15, 57391), (16, 57385), (20, 57316), (25, 57256), (32, 57184), (33, 57139), (34, 57088), (35, 57064),

Gene: Mila11_92 Start: 58019, Stop: 57582, Start Num: 11

Candidate Starts for Mila11_92:

(1, 58163), (Start: 11 @58019 has 35 MA's), (15, 57959), (16, 57953), (23, 57830), (29, 57797), (32, 57752), (34, 57656), (36, 57593),

Gene: MorillMayhem_90 Start: 56858, Stop: 56421, Start Num: 11

Candidate Starts for MorillMayhem_90:

(1, 57002), (Start: 11 @56858 has 35 MA's), (15, 56798), (16, 56792), (23, 56669), (29, 56636), (32, 56591), (34, 56495), (36, 56432),

Gene: Namago_92 Start: 56543, Stop: 56067, Start Num: 11

Candidate Starts for Namago_92:

(Start: 11 @56543 has 35 MA's), (16, 56477), (20, 56408), (25, 56348), (32, 56276), (33, 56231), (34, 56180), (35, 56156),

Gene: Nike_88 Start: 56615, Stop: 56190, Start Num: 11

Candidate Starts for Nike_88:

(9, 56642), (Start: 11 @56615 has 35 MA's), (16, 56549), (21, 56459), (26, 56426), (31, 56363), (33, 56315),

Gene: Phabia_90 Start: 56394, Stop: 55948, Start Num: 11

Candidate Starts for Phabia_90:

(Start: 11 @56394 has 35 MA's), (16, 56328), (18, 56316), (19, 56310), (23, 56196), (29, 56163), (31, 56121), (33, 56073),

Gene: Phinky_96 Start: 58273, Stop: 57830, Start Num: 12

Candidate Starts for Phinky_96:

(2, 58408), (3, 58387), (Start: 12 @58273 has 2 MA's), (16, 58207), (23, 58078), (29, 58045), (31, 58003), (33, 57955), (34, 57904),

Gene: Quammi_89 Start: 56124, Stop: 55687, Start Num: 11

Candidate Starts for Quammi_89:

(5, 56193), (6, 56169), (Start: 7 @56160 has 1 MA's), (8, 56154), (10, 56127), (Start: 11 @56124 has 35 MA's), (13, 56118), (19, 56040), (23, 55935), (29, 55902), (32, 55857), (33, 55812),

Gene: ReginaGlobina_15 Start: 7658, Stop: 8212, Start Num: 7

Candidate Starts for ReginaGlobina_15:

(Start: 4 @7598 has 1 MA's), (Start: 7 @7658 has 1 MA's), (10, 7700), (Start: 11 @7703 has 35 MA's), (14, 7727), (18, 7787), (22, 7871), (23, 7913), (30, 7958), (35, 8117),

Gene: ReginaGlobina_326 Start: 185105, Stop: 185659, Start Num: 7

Candidate Starts for ReginaGlobina_326:

(Start: 4 @185045 has 1 MA's), (Start: 7 @185105 has 1 MA's), (10, 185147), (Start: 11 @185150 has 35 MA's), (14, 185174), (18, 185234), (22, 185318), (23, 185360), (30, 185405), (35, 185564),

Gene: Rowlf_87 Start: 56210, Stop: 55728, Start Num: 11

Candidate Starts for Rowlf_87:

(Start: 11 @56210 has 35 MA's), (15, 56150), (16, 56144), (23, 56015), (29, 55982), (32, 55937), (33, 55892), (34, 55841), (35, 55817),

Gene: Rudy_88 Start: 56208, Stop: 55726, Start Num: 11

Candidate Starts for Rudy_88:

(Start: 11 @56208 has 35 MA's), (15, 56148), (16, 56142), (23, 56013), (27, 56001), (29, 55980), (31, 55938), (33, 55890), (34, 55839),

Gene: SallyK_92 Start: 57360, Stop: 56884, Start Num: 11

Candidate Starts for SallyK_92:

(Start: 11 @57360 has 35 MA's), (16, 57294), (20, 57225), (25, 57165), (32, 57093), (33, 57048), (34, 56997), (35, 56973),

Gene: Sillytadpoles_91 Start: 56045, Stop: 55569, Start Num: 11

Candidate Starts for Sillytadpoles_91:

(Start: 11 @56045 has 35 MA's), (16, 55979), (20, 55910), (25, 55850), (32, 55778), (33, 55733), (34, 55682), (35, 55658),

Gene: SlySloth_93 Start: 56411, Stop: 55971, Start Num: 11

Candidate Starts for SlySloth_93:

(1, 56555), (Start: 11 @56411 has 35 MA's), (16, 56345), (18, 56333), (19, 56327), (21, 56252), (24, 56213), (29, 56186), (32, 56141), (33, 56096),

Gene: Squash_93 Start: 57002, Stop: 56577, Start Num: 11

Candidate Starts for Squash_93:

(1, 57146), (Start: 11 @57002 has 35 MA's), (15, 56942), (16, 56936), (21, 56846), (26, 56813), (31, 56750), (33, 56702),

Gene: Statler_93 Start: 56779, Stop: 56336, Start Num: 11

Candidate Starts for Statler_93:

(Start: 11 @56779 has 35 MA's), (15, 56719), (16, 56713), (23, 56584), (29, 56551), (31, 56509), (33, 56461),

Gene: StrawberryJamm_96 Start: 56314, Stop: 55871, Start Num: 11

Candidate Starts for StrawberryJamm_96:

(Start: 11 @56314 has 35 MA's), (16, 56248), (23, 56119), (29, 56086), (31, 56044), (33, 55996),

Gene: Teehee_91 Start: 56993, Stop: 56517, Start Num: 11

Candidate Starts for Teehee_91:

(Start: 11 @56993 has 35 MA's), (16, 56927), (20, 56858), (25, 56798), (32, 56726), (33, 56681), (34, 56630), (35, 56606),

Gene: Tissue_92 Start: 56701, Stop: 56225, Start Num: 11

Candidate Starts for Tissue_92:

(9, 56728), (Start: 11 @56701 has 35 MA's), (15, 56641), (16, 56635), (20, 56566), (25, 56506), (32, 56434), (33, 56389), (34, 56338), (35, 56314),

Gene: Viceroy_88 Start: 55945, Stop: 55508, Start Num: 11

Candidate Starts for Viceroy_88:

(5, 56014), (6, 55990), (Start: 7 @55981 has 1 MA's), (8, 55975), (10, 55948), (Start: 11 @55945 has 35 MA's), (13, 55939), (19, 55861), (23, 55756), (29, 55723), (32, 55678), (33, 55633),

Gene: Wayne3_92 Start: 56963, Stop: 56517, Start Num: 11

Candidate Starts for Wayne3_92:

(Start: 11 @56963 has 35 MA's), (16, 56897), (18, 56885), (19, 56879), (23, 56765), (29, 56732), (31, 56690), (33, 56642),

Gene: WheelerS25_94 Start: 56807, Stop: 56304, Start Num: 9

Candidate Starts for WheelerS25_94:

(9, 56807), (Start: 11 @56780 has 35 MA's), (16, 56714), (20, 56645), (25, 56585), (32, 56513), (33, 56468), (34, 56417), (35, 56393),

Gene: Wheelie_90 Start: 56284, Stop: 55838, Start Num: 11

Candidate Starts for Wheelie_90:

(Start: 11 @56284 has 35 MA's), (16, 56218), (18, 56206), (19, 56200), (23, 56086), (29, 56053), (31, 56011), (33, 55963),

Gene: Zagie_92 Start: 56805, Stop: 56329, Start Num: 11

Candidate Starts for Zagie_92:

(Start: 11 @56805 has 35 MA's), (16, 56739), (20, 56670), (25, 56610), (32, 56538), (33, 56493), (34, 56442), (35, 56418),

Gene: Zhafia_93 Start: 56839, Stop: 56363, Start Num: 11

Candidate Starts for Zhafia_93:

(Start: 11 @56839 has 35 MA's), (16, 56773), (20, 56704), (25, 56644), (32, 56572), (33, 56527), (34, 56476), (35, 56452),