Pham 296659

1: Cadmus_229 + 1
2: Persimmon_234 + 12
3: HangryHippo_229 + 15
4: Bmoc_236
5: Jay2Jay_237 + 2
6: LilMartin_230 + 2
7: Riptide_232
8: Marsus_233
9: Marsus_235
10: Angela_236 + 2
11: LilSaint_233
12: Mildred21_243
13: Mildred21_241
14: Targaryen_231
15: Samisti12_235
16: EGole_235

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 296659 Report

This analysis was run 04/25/26 on database version 644.

Pham number 296659 has 50 members, 2 are drafts.

Phages represented in each track:
• Track 1 : Cadmus_229, Daubenski_225
• Track 2 : Persimmon_234, Shuckle_230, Navo_225, WhereRU_230, Braelyn_227, FreddyDRoo_235, Eliot67_233, Liandry_231, PinkiePie_231, Davielle_230, Squillium_234, NootNoot_228, Bartholomune_231
• Track 3 : HangryHippo_229, Sushi23_232, Lululemon_228, Pepperwood_231, Leo04_231, Tribute_227, Larnav_231, Watermoore_230, Cursive_234, Peebs_228, BlueOtter_229, Coogler_228, Teutsch_230, PacManQ_228, Scheme_234, Cross_230
• Track 4 : Bmoc_236
• Track 5 : Jay2Jay_237, Warpy_234, Evy_221
• Track 6 : LilMartin_230, Angela_234, MulchMansion_234
• Track 7 : Riptide_232
• Track 8 : Marsus_233
• Track 9 : Marsus_235
• Track 10 : Angela_236, LilMartin_232, MulchMansion_236
• Track 11 : LilSaint_233
• Track 12 : Mildred21_243
• Track 13 : Mildred21_241
• Track 14 : Targaryen_231
• Track 15 : Samisti12_235
• Track 16 : EGole_235

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

The start number called the most often in the published annotations is 3, it was called in 20 of the 48 non-draft genes in the pham.

Genes that call this "Most Annotated" start:
• Bartholomune_231, Bmoc_236, Braelyn_227, Cadmus_229, Daubenski_225, Davielle_230, Eliot67_233, Evy_221, FreddyDRoo_235, Jay2Jay_237, Liandry_231, Navo_225, NootNoot_228, Persimmon_234, PinkiePie_231, Riptide_232, Samisti12_235, Shuckle_230, Squillium_234, Targaryen_231, Warpy_234, WhereRU_230,

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

Genes that do not have the "Most Annotated" start:
• Angela_234, Angela_236, BlueOtter_229, Coogler_228, Cross_230, Cursive_234, EGole_235, HangryHippo_229, Larnav_231, Leo04_231, LilMartin_230, LilMartin_232, LilSaint_233, Lululemon_228, Marsus_233, Marsus_235, Mildred21_241, Mildred21_243, MulchMansion_234, MulchMansion_236, PacManQ_228, Peebs_228, Pepperwood_231, Scheme_234, Sushi23_232, Teutsch_230, Tribute_227, Watermoore_230,

Summary by start number:

Start 2:
• Found in 17 of 50 (34.0%) of genes in pham
• Manual Annotations of this start: 17 of 48
• Called 100.0% of time when present
• Phage (with cluster) where this start called: BlueOtter_229 (BE1), Coogler_228 (BE1), Cross_230 (BE1), Cursive_234 (BE1), EGole_235 (BE1), HangryHippo_229 (BE1), Larnav_231 (BE1), Leo04_231 (BE1), Lululemon_228 (BE1), PacManQ_228 (BE1), Peebs_228 (BE1), Pepperwood_231 (BE1), Scheme_234 (BE1), Sushi23_232 (BE1), Teutsch_230 (BE1), Tribute_227 (BE1), Watermoore_230 (BE1),

Start 3:
• Found in 22 of 50 (44.0%) of genes in pham
• Manual Annotations of this start: 20 of 48
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Bartholomune_231 (BE1), Bmoc_236 (BE1), Braelyn_227 (BE1), Cadmus_229 (BE1), Daubenski_225 (BE1), Davielle_230 (BE1), Eliot67_233 (BE1), Evy_221 (BE1), FreddyDRoo_235 (BE1), Jay2Jay_237 (BE1), Liandry_231 (BE1), Navo_225 (BE1), NootNoot_228 (BE1), Persimmon_234 (BE1), PinkiePie_231 (BE1), Riptide_232 (BE1), Samisti12_235 (BE1), Shuckle_230 (BE1), Squillium_234 (BE1), Targaryen_231 (BE1), Warpy_234 (BE1), WhereRU_230 (BE1),

Start 4:
• Found in 8 of 50 (16.0%) of genes in pham
• Manual Annotations of this start: 6 of 48
• Called 75.0% of time when present
• Phage (with cluster) where this start called: Angela_236 (BE1), LilMartin_232 (BE1), LilSaint_233 (BE1), Marsus_235 (BE1), Mildred21_243 (BE1), MulchMansion_236 (BE1),

Start 5:
• Found in 5 of 50 (10.0%) of genes in pham
• Manual Annotations of this start: 5 of 48
• Called 100.0% of time when present
• Phage (with cluster) where this start called: Angela_234 (BE1), LilMartin_230 (BE1), Marsus_233 (BE1), Mildred21_241 (BE1), MulchMansion_234 (BE1),

Summary by clusters:

There is one cluster represented in this pham: BE1

Info for manual annotations of cluster BE1:
•Start number 2 was manually annotated 17 times for cluster BE1.
•Start number 3 was manually annotated 20 times for cluster BE1.
•Start number 4 was manually annotated 6 times for cluster BE1.
•Start number 5 was manually annotated 5 times for cluster BE1.

Gene Information:

Gene: Angela_236 Start: 115493, Stop: 115711, Start Num: 4
Candidate Starts for Angela_236:
(Start: 4 @115493 has 6 MA's), (16, 115616), (19, 115664), (20, 115676), (21, 115685), (23, 115697),

Gene: Angela_234 Start: 115083, Stop: 115298, Start Num: 5
Candidate Starts for Angela_234:
(Start: 5 @115083 has 5 MA's), (21, 115260), (24, 115278),

Gene: Bartholomune_231 Start: 114849, Stop: 115082, Start Num: 3
Candidate Starts for Bartholomune_231:
(Start: 3 @114849 has 20 MA's), (7, 114894), (10, 114939), (20, 115047),

Gene: BlueOtter_229 Start: 114987, Stop: 115226, Start Num: 2
Candidate Starts for BlueOtter_229:
(Start: 2 @114987 has 17 MA's), (8, 115053), (16, 115131), (17, 115143), (19, 115179), (20, 115191),

Gene: Bmoc_236 Start: 115531, Stop: 115764, Start Num: 3
Candidate Starts for Bmoc_236:
(Start: 3 @115531 has 20 MA's), (Start: 4 @115546 has 6 MA's), (11, 115624), (20, 115729),

Gene: Braelyn_227 Start: 114496, Stop: 114729, Start Num: 3
Candidate Starts for Braelyn_227:
(Start: 3 @114496 has 20 MA's), (7, 114541), (10, 114586), (20, 114694),

Gene: Cadmus_229 Start: 116211, Stop: 116441, Start Num: 3
Candidate Starts for Cadmus_229:
(Start: 3 @116211 has 20 MA's), (6, 116232), (16, 116346), (19, 116394), (20, 116406),

Gene: Coogler_228 Start: 115412, Stop: 115651, Start Num: 2
Candidate Starts for Coogler_228:
(Start: 2 @115412 has 17 MA's), (8, 115478), (16, 115556), (17, 115568), (19, 115604), (20, 115616),

Gene: Cross_230 Start: 115632, Stop: 115871, Start Num: 2
Candidate Starts for Cross_230:
(Start: 2 @115632 has 17 MA's), (8, 115698), (16, 115776), (17, 115788), (19, 115824), (20, 115836),

Gene: Cursive_234 Start: 115739, Stop: 115978, Start Num: 2
Candidate Starts for Cursive_234:
(Start: 2 @115739 has 17 MA's), (8, 115805), (16, 115883), (17, 115895), (19, 115931), (20, 115943),

Gene: Daubenski_225 Start: 116112, Stop: 116342, Start Num: 3
Candidate Starts for Daubenski_225:

(Start: 3 @116112 has 20 MA's), (6, 116133), (16, 116247), (19, 116295), (20, 116307),

Gene: Davielle_230 Start: 114894, Stop: 115127, Start Num: 3
Candidate Starts for Davielle_230:
(Start: 3 @114894 has 20 MA's), (7, 114939), (10, 114984), (20, 115092),

Gene: EGole_235 Start: 117823, Stop: 118062, Start Num: 2
Candidate Starts for EGole_235:
(Start: 2 @117823 has 17 MA's), (8, 117889), (12, 117925), (16, 117967), (17, 117979), (19, 118015), (20, 118027),

Gene: Eliot67_233 Start: 114678, Stop: 114911, Start Num: 3
Candidate Starts for Eliot67_233:
(Start: 3 @114678 has 20 MA's), (7, 114723), (10, 114768), (20, 114876),

Gene: Evy_221 Start: 115809, Stop: 116042, Start Num: 3
Candidate Starts for Evy_221:
(Start: 3 @115809 has 20 MA's), (7, 115854), (10, 115899), (20, 116007), (24, 116034),

Gene: FreddyDRoo_235 Start: 114678, Stop: 114911, Start Num: 3
Candidate Starts for FreddyDRoo_235:
(Start: 3 @114678 has 20 MA's), (7, 114723), (10, 114768), (20, 114876),

Gene: HangryHippo_229 Start: 114987, Stop: 115226, Start Num: 2
Candidate Starts for HangryHippo_229:
(Start: 2 @114987 has 17 MA's), (8, 115053), (16, 115131), (17, 115143), (19, 115179), (20, 115191),

Gene: Jay2Jay_237 Start: 115964, Stop: 116197, Start Num: 3
Candidate Starts for Jay2Jay_237:
(Start: 3 @115964 has 20 MA's), (7, 116009), (10, 116054), (20, 116162), (24, 116189),

Gene: Larnav_231 Start: 115905, Stop: 116144, Start Num: 2
Candidate Starts for Larnav_231:
(Start: 2 @115905 has 17 MA's), (8, 115971), (16, 116049), (17, 116061), (19, 116097), (20, 116109),

Gene: Leo04_231 Start: 116013, Stop: 116252, Start Num: 2
Candidate Starts for Leo04_231:
(Start: 2 @116013 has 17 MA's), (8, 116079), (16, 116157), (17, 116169), (19, 116205), (20, 116217),

Gene: Liandry_231 Start: 115385, Stop: 115618, Start Num: 3
Candidate Starts for Liandry_231:
(Start: 3 @115385 has 20 MA's), (7, 115430), (10, 115475), (20, 115583),

Gene: LilMartin_230 Start: 114023, Stop: 114238, Start Num: 5
Candidate Starts for LilMartin_230:
(Start: 5 @114023 has 5 MA's), (21, 114200), (24, 114218),

Gene: LilMartin_232 Start: 114433, Stop: 114651, Start Num: 4
Candidate Starts for LilMartin_232:
(Start: 4 @114433 has 6 MA's), (16, 114556), (19, 114604), (20, 114616), (21, 114625), (23, 114637),

Gene: LilSaint_233 Start: 115454, Stop: 115672, Start Num: 4
Candidate Starts for LilSaint_233:

(Start: 4 @115454 has 6 MA's), (16, 115577), (19, 115625), (20, 115637),

Gene: Lululemon_228 Start: 114792, Stop: 115031, Start Num: 2
Candidate Starts for Lululemon_228:
(Start: 2 @114792 has 17 MA's), (8, 114858), (16, 114936), (17, 114948), (19, 114984), (20, 114996),

Gene: Marsus_233 Start: 115688, Stop: 115903, Start Num: 5
Candidate Starts for Marsus_233:
(Start: 5 @115688 has 5 MA's), (12, 115766), (21, 115865), (24, 115883),

Gene: Marsus_235 Start: 116098, Stop: 116316, Start Num: 4
Candidate Starts for Marsus_235:
(Start: 4 @116098 has 6 MA's), (16, 116221), (19, 116269), (20, 116281), (21, 116290),

Gene: Mildred21_243 Start: 114583, Stop: 114801, Start Num: 4
Candidate Starts for Mildred21_243:
(1, 114547), (Start: 4 @114583 has 6 MA's), (16, 114706), (20, 114766), (22, 114784),

Gene: Mildred21_241 Start: 114172, Stop: 114375, Start Num: 5
Candidate Starts for Mildred21_241:
(Start: 5 @114172 has 5 MA's), (9, 114235), (13, 114262), (22, 114358), (24, 114367),

Gene: MulchMansion_236 Start: 116067, Stop: 116285, Start Num: 4
Candidate Starts for MulchMansion_236:
(Start: 4 @116067 has 6 MA's), (16, 116190), (19, 116238), (20, 116250), (21, 116259), (23, 116271),

Gene: MulchMansion_234 Start: 115657, Stop: 115872, Start Num: 5
Candidate Starts for MulchMansion_234:
(Start: 5 @115657 has 5 MA's), (21, 115834), (24, 115852),

Gene: Navo_225 Start: 113700, Stop: 113933, Start Num: 3
Candidate Starts for Navo_225:
(Start: 3 @113700 has 20 MA's), (7, 113745), (10, 113790), (20, 113898),

Gene: NootNoot_228 Start: 114230, Stop: 114463, Start Num: 3
Candidate Starts for NootNoot_228:
(Start: 3 @114230 has 20 MA's), (7, 114275), (10, 114320), (20, 114428),

Gene: PacManQ_228 Start: 114792, Stop: 115031, Start Num: 2
Candidate Starts for PacManQ_228:
(Start: 2 @114792 has 17 MA's), (8, 114858), (16, 114936), (17, 114948), (19, 114984), (20, 114996),

Gene: Peebs_228 Start: 115876, Stop: 116115, Start Num: 2
Candidate Starts for Peebs_228:
(Start: 2 @115876 has 17 MA's), (8, 115942), (16, 116020), (17, 116032), (19, 116068), (20, 116080),

Gene: Pepperwood_231 Start: 115684, Stop: 115923, Start Num: 2
Candidate Starts for Pepperwood_231:
(Start: 2 @115684 has 17 MA's), (8, 115750), (16, 115828), (17, 115840), (19, 115876), (20, 115888),

Gene: Persimmon_234 Start: 114718, Stop: 114951, Start Num: 3
Candidate Starts for Persimmon_234:
(Start: 3 @114718 has 20 MA's), (7, 114763), (10, 114808), (20, 114916),

Gene: PinkiePie_231 Start: 115385, Stop: 115618, Start Num: 3
Candidate Starts for PinkiePie_231:
(Start: 3 @115385 has 20 MA's), (7, 115430), (10, 115475), (20, 115583),

Gene: Riptide_232 Start: 114393, Stop: 114626, Start Num: 3
Candidate Starts for Riptide_232:
(Start: 3 @114393 has 20 MA's), (Start: 4 @114408 has 6 MA's), (12, 114489), (15, 114528), (18, 114552), (19, 114579), (20, 114591),

Gene: Samisti12_235 Start: 117277, Stop: 117507, Start Num: 3
Candidate Starts for Samisti12_235:
(Start: 3 @117277 has 20 MA's), (10, 117367), (14, 117403), (20, 117475), (24, 117502),

Gene: Scheme_234 Start: 116923, Stop: 117162, Start Num: 2
Candidate Starts for Scheme_234:
(Start: 2 @116923 has 17 MA's), (8, 116989), (16, 117067), (17, 117079), (19, 117115), (20, 117127),

Gene: Shuckle_230 Start: 116236, Stop: 116469, Start Num: 3
Candidate Starts for Shuckle_230:
(Start: 3 @116236 has 20 MA's), (7, 116281), (10, 116326), (20, 116434),

Gene: Squillium_234 Start: 115387, Stop: 115620, Start Num: 3
Candidate Starts for Squillium_234:
(Start: 3 @115387 has 20 MA's), (7, 115432), (10, 115477), (20, 115585),

Gene: Sushi23_232 Start: 116742, Stop: 116981, Start Num: 2
Candidate Starts for Sushi23_232:
(Start: 2 @116742 has 17 MA's), (8, 116808), (16, 116886), (17, 116898), (19, 116934), (20, 116946),

Gene: Targaryen_231 Start: 116917, Stop: 117150, Start Num: 3
Candidate Starts for Targaryen_231:
(Start: 3 @116917 has 20 MA's), (7, 116962), (10, 117007), (16, 117055), (20, 117115), (24, 117142),

Gene: Teutsch_230 Start: 116107, Stop: 116346, Start Num: 2
Candidate Starts for Teutsch_230:
(Start: 2 @116107 has 17 MA's), (8, 116173), (16, 116251), (17, 116263), (19, 116299), (20, 116311),

Gene: Tribute_227 Start: 116272, Stop: 116511, Start Num: 2
Candidate Starts for Tribute_227:
(Start: 2 @116272 has 17 MA's), (8, 116338), (16, 116416), (17, 116428), (19, 116464), (20, 116476),

Gene: Warpy_234 Start: 115402, Stop: 115635, Start Num: 3
Candidate Starts for Warpy_234:
(Start: 3 @115402 has 20 MA's), (7, 115447), (10, 115492), (20, 115600), (24, 115627),

Gene: Watermoore_230 Start: 116630, Stop: 116869, Start Num: 2
Candidate Starts for Watermoore_230:
(Start: 2 @116630 has 17 MA's), (8, 116696), (16, 116774), (17, 116786), (19, 116822), (20, 116834),

Gene: WhereRU_230 Start: 114879, Stop: 115112, Start Num: 3
Candidate Starts for WhereRU_230:
(Start: 3 @114879 has 20 MA's), (7, 114924), (10, 114969), (20, 115077),