Pham 106576


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 106576 Report

This analysis was run 04/05/24 on database version 557.
Pham number 106576 has 20 members, 0 are drafts.
Phages represented in each track:

- Track 1 : CactusRose_90, Gyzlar_76, Dynamix_84, Paphu_81, HarryOW_85
- Track 2 : Burton_87
- Track 3 : Froghopper_72, Arlo_86
- Track 4 : BaconJack_ $\mathbf{8 9}$, Sibs $\overline{6}$ _88
- Track 5 : Briton15_88
- Track 6 : DreamCātcher_89
- Track 7 : Rajelicia_86, Snazzy_86, KyMonks1A_91, NEHalo_82, Ohno789_89
- Track 8 : Norz_81
- Track 9 : Parliament_85, Lamina13_87


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

The start number called the most often in the published annotations is 1 , it was called in 15 of the 20 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Arlo_86, BaconJack_89, Briton15_88, CactusRose_90, Dynamix_84,

Froghopper_72, Gyzlār_76, HarryOW_85, KyMonks1A_91, NEHalo_82,
Ohno789_89, Paphu_81, Rajelicia_86, Sibs6_88, Snazzy_86,
Genes that have the "Most Annotated" start but do not call it:

- DreamCatcher_89, Lamina13_87, Parliament_85,

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

- Burton_87, Norz_81,


## Summary by start number:

Start 1:

- Found in 18 of 20 (90.0\%) of genes in pham
- Manual Annotations of this start: 15 of 20
- Called $83.3 \%$ of time when present
- Phage (with cluster) where this start called: Arlo_86 (A1), BaconJack_89 (A1),

Briton15_88 (A1), CactusRose_90 (A1), Dynamix_84 (A1), Froghopper_72 (A1),

Gyzlar_76 (A1), HarryOW_85 (A1), KyMonks1A_91 (A1), NEHalo_82 (A1), Ohno789_89 (A1), Paphu_81 (A1), Rajelicia_86 (A1), Sibs6_88 (̄ㅜ), Snazzy_86 (A1),

Start 2:

- Found in 20 of 20 ( $100.0 \%$ ) of genes in pham
- Manual Annotations of this start: 5 of 20
- Called $25.0 \%$ of time when present
- Phage (with cluster) where this start called: Burton_87 (A1), DreamCatcher_89 (A1), Lamina13_87 (A1), Norz_81 (A1), Parliament_85 (A1),


## Summary by clusters:

There is one cluster represented in this pham: A1
Info for manual annotations of cluster A1:

- Start number 1 was manually annotated 15 times for cluster A1.
-Start number 2 was manually annotated 5 times for cluster A1.


## Gene Information:

Gene: Arlo_86 Start: 49278, Stop: 49123, Start Num: 1
Candidate Starts for Arlo_86:
(Start: 1 @49278 has 15 MA's), (Start: 2 @49251 has 5 MA's), (4, 49224),
Gene: BaconJack_89 Start: 51009, Stop: 50845, Start Num: 1
Candidate Starts for BaconJack_89:
(Start: 1 @51009 has 15 MA's), (Start: 2 @50982 has 5 MA's), (4, 50955), (5, 50865),
Gene: Briton15_88 Start: 49944, Stop: 49768, Start Num: 1
Candidate Starts for Briton15_88:
(Start: 1 @49944 has 15 MA's), (Start: 2 @49917 has 5 MA's), (3, 49896), (4, 49890), (5, 49800),
Gene: Burton_87 Start: 51034, Stop: 50906, Start Num: 2
Candidate Starts for Burton_87:
(Start: 2 @51034 has 5 MA's), (3, 51013), (4, 51007),
Gene: CactusRose_90 Start: 49994, Stop: 49821, Start Num: 1
Candidate Starts for CactusRose_90:
(Start: 1 @49994 has 15 MA's), (Start: 2 @49967 has 5 MA's), (3, 49946), (4, 49940), (5, 49850), (6, 49829),

Gene: DreamCatcher_89 Start: 49533, Stop: 49384, Start Num: 2
Candidate Starts for DreamCatcher_89:
(Start: 1 @ 49560 has 15 MA's), (Start: 2 @49533 has 5 MA's), (4, 49506), ( 5,49416 ),
Gene: Dynamix_84 Start: 47288, Stop: 47115, Start Num: 1
Candidate Starts for Dynamix_84:
(Start: 1 @47288 has 15 MA's), (Start: 2 @47261 has 5 MA's), (3, 47240), (4, 47234), (5, 47144), (6, 47123),

Gene: Froghopper_72 Start: 45039, Stop: 44884, Start Num: 1
Candidate Starts for Froghopper_72:
(Start: 1 @45039 has 15 MA's), (Start: 2 @45012 has 5 MA's), (4, 44985),
Gene: Gyzlar_76 Start: 45083, Stop: 44910, Start Num: 1
Candidate Starts for Gyzlar_76:
(Start: 1 @45083 has 15 MA's), (Start: 2 @45056 has 5 MA's), (3, 45035), (4, 45029), (5, 44939), (6, 44918),

Gene: HarryOW_85 Start: 50108, Stop: 49935, Start Num: 1
Candidate Starts for HarryOW_85:
(Start: 1 @50108 has 15 MA's), (Start: 2 @50081 has 5 MA's), (3, 50060), (4, 50054), (5, 49964), (6, 49943),

Gene: KyMonks1A_91 Start: 49829, Stop: 49656, Start Num: 1
Candidate Starts for KyMonks1A_91:
(Start: 1 @49829 has 15 MA's), (Start: 2 @49802 has 5 MA's), (4, 49775), ( 5,49685 ), ( 6,49664 ),
Gene: Lamina13_87 Start: 50524, Stop: 50378, Start Num: 2
Candidate Starts for Lamina13_87:
(Start: 1 @50551 has 15 MA's), (Start: 2 @50524 has 5 MA's), (4, 50497), (5, 50407), (6, 50386),
Gene: NEHalo_82 Start: 48188, Stop: 48015, Start Num: 1
Candidate Starts for NEHalo_82:
(Start: 1 @48188 has 15 MA's), (Start: 2 @48161 has 5 MA's), (4, 48134), (5, 48044), (6, 48023),
Gene: Norz_81 Start: 50898, Stop: 50752, Start Num: 2
Candidate Starts for Norz_81:
(Start: 2 @50898 has 5 MA's), ( 3,50877 ), (4, 50871), (5, 50781), (6, 50760),
Gene: Ohno789_89 Start: 50417, Stop: 50244, Start Num: 1
Candidate Starts for Ohno789_89:
(Start: 1 @50417 has 15 MA's), (Start: 2 @50390 has 5 MA's), (4, 50363), ( 5,50273 ), ( 6,50252 ),
Gene: Paphu_81 Start: 47874, Stop: 47701, Start Num: 1
Candidate Starts for Paphu_81:
(Start: 1 @47874 has 15 MA's), (Start: 2 @47847 has 5 MA's), (3, 47826), (4, 47820), (5, 47730), (6, 47709),

Gene: Parliament_85 Start: 51007, Stop: 50861, Start Num: 2
Candidate Starts for Parliament_85:
(Start: 1 @51034 has 15 MA's), (Start: 2 @51007 has 5 MA's), (4, 50980), ( 5,50890 ), ( 6,50869 ),
Gene: Rajelicia_86 Start: 51261, Stop: 51088, Start Num: 1
Candidate Starts for Rajelicia_86:
(Start: 1 @ 51261 has 15 MA's), (Start: 2 @51234 has 5 MA's), (4, 51207), ( 5,51117 ), ( 6,51096 ),
Gene: Sibs6_88 Start: 46921, Stop: 46757, Start Num: 1
Candidate Starts for Sibs6_88:
(Start: 1 @ 46921 has 15 MA's), (Start: 2 @46894 has 5 MA's), (4, 46867), (5, 46777),
Gene: Snazzy_86 Start: 49312, Stop: 49139, Start Num: 1
Candidate Starts for Snazzy_86:
(Start: 1 @49312 has 15 MA's), (Start: 2 @49285 has 5 MA's), (4, 49258), (5, 49168), (6, 49147),

