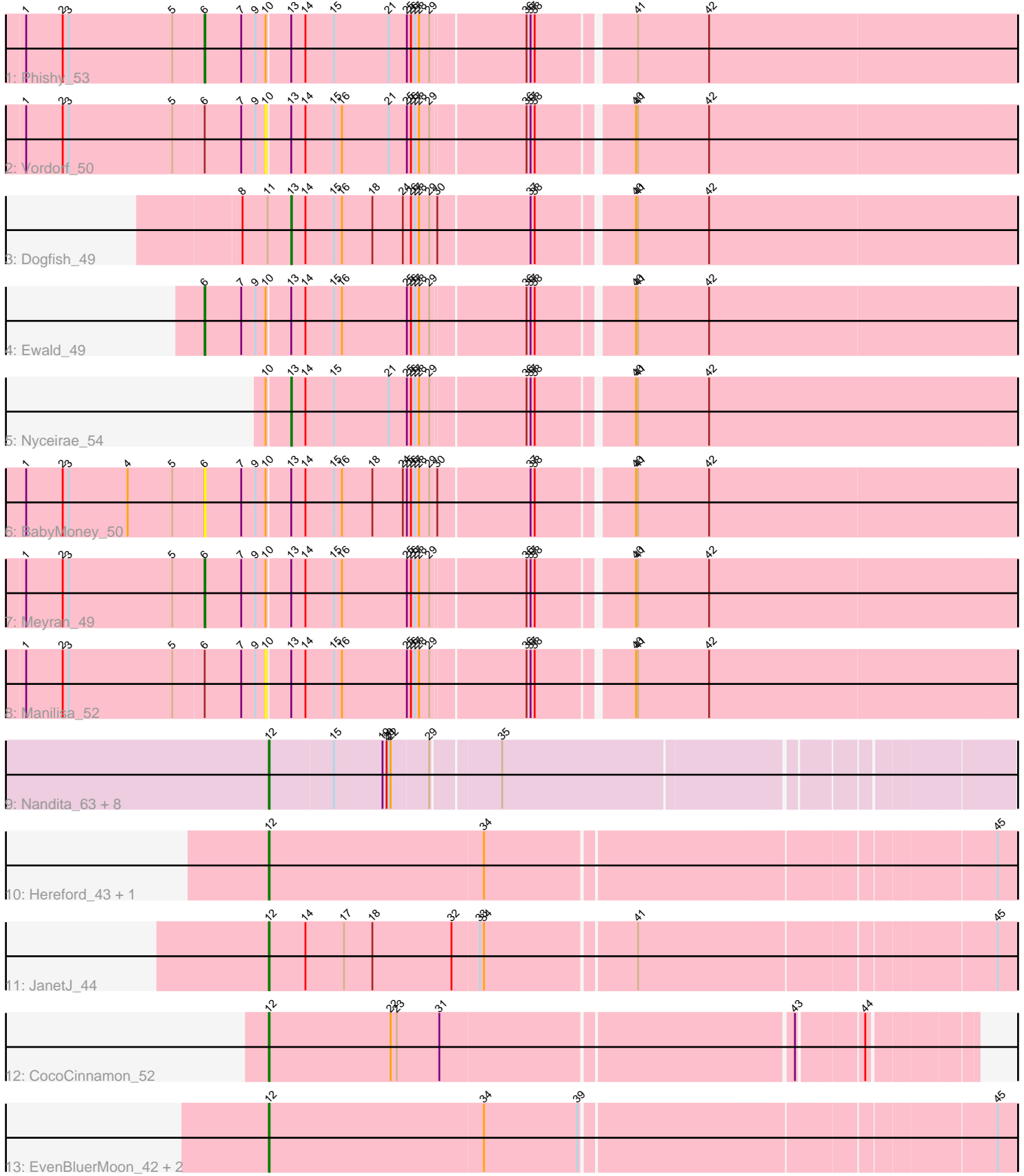


Pham 303616



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 303616 Report

This analysis was run 06/08/26 on database version 649.

Pham number 303616 has 24 members, 7 are drafts.

Phages represented in each track:

- Track 1 : Phishy\_53
- Track 2 : Vordorf\_50
- Track 3 : Dogfish\_49
- Track 4 : Ewald\_49
- Track 5 : Nyceirae\_54
- Track 6 : BabyMoney\_50
- Track 7 : Meyran\_49
- Track 8 : Manilisa\_52
- Track 9 : Nandita\_63, Donatella\_63, Dirdigger\_60, Yonex\_64, Kihatsu\_64, Ryan\_64, Lenoxika\_60, ToastyOats\_64, Ichiang\_60
- Track 10 : Hereford\_43, Aoka\_46
- Track 11 : JanetJ\_44
- Track 12 : CocoCinnamon\_52
- Track 13 : EvenBluerMoon\_42, PrairieDogTown\_43, Morrey\_65

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

The start number called the most often in the published annotations is 12, it was called in 12 of the 17 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Aoka\_46, CocoCinnamon\_52, Dirdigger\_60, Donatella\_63, EvenBluerMoon\_42, Hereford\_43, Ichiang\_60, JanetJ\_44, Kihatsu\_64, Lenoxika\_60, Morrey\_65, Nandita\_63, PrairieDogTown\_43, Ryan\_64, ToastyOats\_64, Yonex\_64,

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

- 

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

- BabyMoney\_50, Dogfish\_49, Ewald\_49, Manilisa\_52, Meyran\_49, Nyceirae\_54, Phishy\_53, Vordorf\_50,

**Summary by start number:**

Start 6:

- Found in 6 of 24 ( 25.0% ) of genes in pham
- Manual Annotations of this start: 3 of 17
- Called 66.7% of time when present
- Phage (with cluster) where this start called: BabyMoney\_50 (DT), Ewald\_49 (DT), Meyran\_49 (DT), Phishy\_53 (DT),

Start 10:

- Found in 7 of 24 ( 29.2% ) of genes in pham
- No Manual Annotations of this start.
- Called 28.6% of time when present
- Phage (with cluster) where this start called: Manilisa\_52 (DT), Vordorf\_50 (DT),

Start 12:

- Found in 16 of 24 ( 66.7% ) of genes in pham
- Manual Annotations of this start: 12 of 17
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Aoka\_46 (FO), CocoCinnamon\_52 (FO), Dirtdigger\_60 (FF), Donatella\_63 (FF), EvenBluerMoon\_42 (FO), Hereford\_43 (FO), Ichiang\_60 (FF), JanetJ\_44 (FO), Kihatsu\_64 (FF), Lenoxika\_60 (FF), Morrey\_65 (FO), Nandita\_63 (FF), PrairieDogTown\_43 (FO), Ryan\_64 (FF), ToastyOats\_64 (FF), Yonex\_64 (FF),

Start 13:

- Found in 8 of 24 ( 33.3% ) of genes in pham
- Manual Annotations of this start: 2 of 17
- Called 25.0% of time when present
- Phage (with cluster) where this start called: Dogfish\_49 (DT), Nyceirae\_54 (DT),

**Summary by clusters:**

There are 3 clusters represented in this pham: DT, FF, FO,

Info for manual annotations of cluster DT:

- Start number 6 was manually annotated 3 times for cluster DT.
- Start number 13 was manually annotated 2 times for cluster DT.

Info for manual annotations of cluster FF:

- Start number 12 was manually annotated 6 times for cluster FF.

Info for manual annotations of cluster FO:

- Start number 12 was manually annotated 6 times for cluster FO.

**Gene Information:**

Gene: Aoka\_46 Start: 32046, Stop: 33164, Start Num: 12

Candidate Starts for Aoka\_46:

(Start: 12 @32046 has 12 MA's), (34, 32361), (45, 33066),

Gene: BabyMoney\_50 Start: 37319, Stop: 38551, Start Num: 6

Candidate Starts for BabyMoney\_50:

(1, 37058), (2, 37112), (3, 37121), (4, 37208), (5, 37274), (Start: 6 @37319 has 3 MA's), (7, 37373), (9, 37394), (10, 37409), (Start: 13 @37442 has 2 MA's), (14, 37463), (15, 37505), (16, 37517), (18, 37562), (24, 37607), (25, 37613), (26, 37619), (27, 37625), (28, 37631), (29, 37646), (30, 37655), (37, 37787), (38, 37793), (40, 37922), (41, 37925), (42, 38030),

Gene: CocoCinnamon\_52 Start: 32925, Stop: 33902, Start Num: 12

Candidate Starts for CocoCinnamon\_52:

(Start: 12 @32925 has 12 MA's), (22, 33105), (23, 33114), (31, 33177), (43, 33675), (44, 33762),

Gene: Dirtdigger\_60 Start: 38872, Stop: 39894, Start Num: 12

Candidate Starts for Dirtdigger\_60:

(Start: 12 @38872 has 12 MA's), (15, 38965), (19, 39037), (20, 39043), (21, 39046), (22, 39049), (29, 39103), (35, 39196),

Gene: Dogfish\_49 Start: 36865, Stop: 37968, Start Num: 13

Candidate Starts for Dogfish\_49:

(8, 36796), (11, 36832), (Start: 13 @36865 has 2 MA's), (14, 36886), (15, 36928), (16, 36940), (18, 36985), (24, 37030), (26, 37042), (27, 37048), (28, 37054), (29, 37069), (30, 37078), (37, 37210), (38, 37216), (40, 37345), (41, 37348), (42, 37453),

Gene: Donatella\_63 Start: 39063, Stop: 40085, Start Num: 12

Candidate Starts for Donatella\_63:

(Start: 12 @39063 has 12 MA's), (15, 39156), (19, 39228), (20, 39234), (21, 39237), (22, 39240), (29, 39294), (35, 39387),

Gene: EvenBluerMoon\_42 Start: 31418, Stop: 32536, Start Num: 12

Candidate Starts for EvenBluerMoon\_42:

(Start: 12 @31418 has 12 MA's), (34, 31733), (39, 31871), (45, 32438),

Gene: Ewald\_49 Start: 36559, Stop: 37788, Start Num: 6

Candidate Starts for Ewald\_49:

(Start: 6 @36559 has 3 MA's), (7, 36613), (9, 36634), (10, 36649), (Start: 13 @36682 has 2 MA's), (14, 36703), (15, 36745), (16, 36757), (25, 36853), (26, 36859), (27, 36865), (28, 36871), (29, 36886), (36, 37018), (37, 37024), (38, 37030), (40, 37159), (41, 37162), (42, 37267),

Gene: Hereford\_43 Start: 31162, Stop: 32280, Start Num: 12

Candidate Starts for Hereford\_43:

(Start: 12 @31162 has 12 MA's), (34, 31477), (45, 32182),

Gene: Ichiang\_60 Start: 38423, Stop: 39445, Start Num: 12

Candidate Starts for Ichiang\_60:

(Start: 12 @38423 has 12 MA's), (15, 38516), (19, 38588), (20, 38594), (21, 38597), (22, 38600), (29, 38654), (35, 38747),

Gene: JanetJ\_44 Start: 32563, Stop: 33687, Start Num: 12

Candidate Starts for JanetJ\_44:

(Start: 12 @32563 has 12 MA's), (14, 32617), (17, 32674), (18, 32716), (32, 32833), (33, 32872), (34, 32878), (41, 33091), (45, 33583),

Gene: Kihatsu\_64 Start: 39971, Stop: 40993, Start Num: 12

Candidate Starts for Kihatsu\_64:

(Start: 12 @39971 has 12 MA's), (15, 40064), (19, 40136), (20, 40142), (21, 40145), (22, 40148), (29, 40202), (35, 40295),

Gene: Lenoxika\_60 Start: 38298, Stop: 39320, Start Num: 12

Candidate Starts for Lenoxika\_60:

(Start: 12 @38298 has 12 MA's), (15, 38391), (19, 38463), (20, 38469), (21, 38472), (22, 38475), (29, 38529), (35, 38622),

Gene: Manilisa\_52 Start: 37821, Stop: 38960, Start Num: 10

Candidate Starts for Manilisa\_52:

(1, 37470), (2, 37524), (3, 37533), (5, 37686), (Start: 6 @37731 has 3 MA's), (7, 37785), (9, 37806), (10, 37821), (Start: 13 @37854 has 2 MA's), (14, 37875), (15, 37917), (16, 37929), (25, 38025), (26, 38031), (27, 38037), (28, 38043), (29, 38058), (36, 38190), (37, 38196), (38, 38202), (40, 38331), (41, 38334), (42, 38439),

Gene: Meyran\_49 Start: 37660, Stop: 38889, Start Num: 6

Candidate Starts for Meyran\_49:

(1, 37399), (2, 37453), (3, 37462), (5, 37615), (Start: 6 @37660 has 3 MA's), (7, 37714), (9, 37735), (10, 37750), (Start: 13 @37783 has 2 MA's), (14, 37804), (15, 37846), (16, 37858), (25, 37954), (26, 37960), (27, 37966), (28, 37972), (29, 37987), (36, 38119), (37, 38125), (38, 38131), (40, 38260), (41, 38263), (42, 38368),

Gene: Morrey\_65 Start: 31420, Stop: 32538, Start Num: 12

Candidate Starts for Morrey\_65:

(Start: 12 @31420 has 12 MA's), (34, 31735), (39, 31873), (45, 32440),

Gene: Nandita\_63 Start: 38985, Stop: 40007, Start Num: 12

Candidate Starts for Nandita\_63:

(Start: 12 @38985 has 12 MA's), (15, 39078), (19, 39150), (20, 39156), (21, 39159), (22, 39162), (29, 39216), (35, 39309),

Gene: Nyceirae\_54 Start: 37807, Stop: 38916, Start Num: 13

Candidate Starts for Nyceirae\_54:

(10, 37774), (Start: 13 @37807 has 2 MA's), (14, 37828), (15, 37870), (21, 37951), (25, 37978), (26, 37984), (27, 37990), (28, 37996), (29, 38011), (36, 38143), (37, 38149), (38, 38155), (40, 38284), (41, 38287), (42, 38392),

Gene: Phishy\_53 Start: 38633, Stop: 39862, Start Num: 6

Candidate Starts for Phishy\_53:

(1, 38372), (2, 38426), (3, 38435), (5, 38588), (Start: 6 @38633 has 3 MA's), (7, 38687), (9, 38708), (10, 38723), (Start: 13 @38756 has 2 MA's), (14, 38777), (15, 38819), (21, 38900), (25, 38927), (26, 38933), (27, 38939), (28, 38945), (29, 38960), (36, 39092), (37, 39098), (38, 39104), (41, 39236), (42, 39341),

Gene: PrairieDogTown\_43 Start: 31420, Stop: 32538, Start Num: 12

Candidate Starts for PrairieDogTown\_43:

(Start: 12 @31420 has 12 MA's), (34, 31735), (39, 31873), (45, 32440),

Gene: Ryan\_64 Start: 39538, Stop: 40560, Start Num: 12

Candidate Starts for Ryan\_64:

(Start: 12 @39538 has 12 MA's), (15, 39631), (19, 39703), (20, 39709), (21, 39712), (22, 39715), (29, 39769), (35, 39862),

Gene: ToastyOats\_64 Start: 38718, Stop: 39740, Start Num: 12

Candidate Starts for ToastyOats\_64:

(Start: 12 @38718 has 12 MA's), (15, 38811), (19, 38883), (20, 38889), (21, 38892), (22, 38895), (29, 38949), (35, 39042),

Gene: Vordorf\_50 Start: 37013, Stop: 38146, Start Num: 10

Candidate Starts for Vordorf\_50:

(1, 36662), (2, 36716), (3, 36725), (5, 36878), (Start: 6 @36923 has 3 MA's), (7, 36977), (9, 36998), (10, 37013), (Start: 13 @37046 has 2 MA's), (14, 37067), (15, 37109), (16, 37121), (21, 37190), (25, 37217), (26, 37223), (27, 37229), (28, 37235), (29, 37250), (36, 37382), (37, 37388), (38, 37394), (40, 37523), (41, 37526), (42, 37631),

Gene: Yonex\_64 Start: 39538, Stop: 40560, Start Num: 12

Candidate Starts for Yonex\_64:

(Start: 12 @39538 has 12 MA's), (15, 39631), (19, 39703), (20, 39709), (21, 39712), (22, 39715), (29, 39769), (35, 39862),