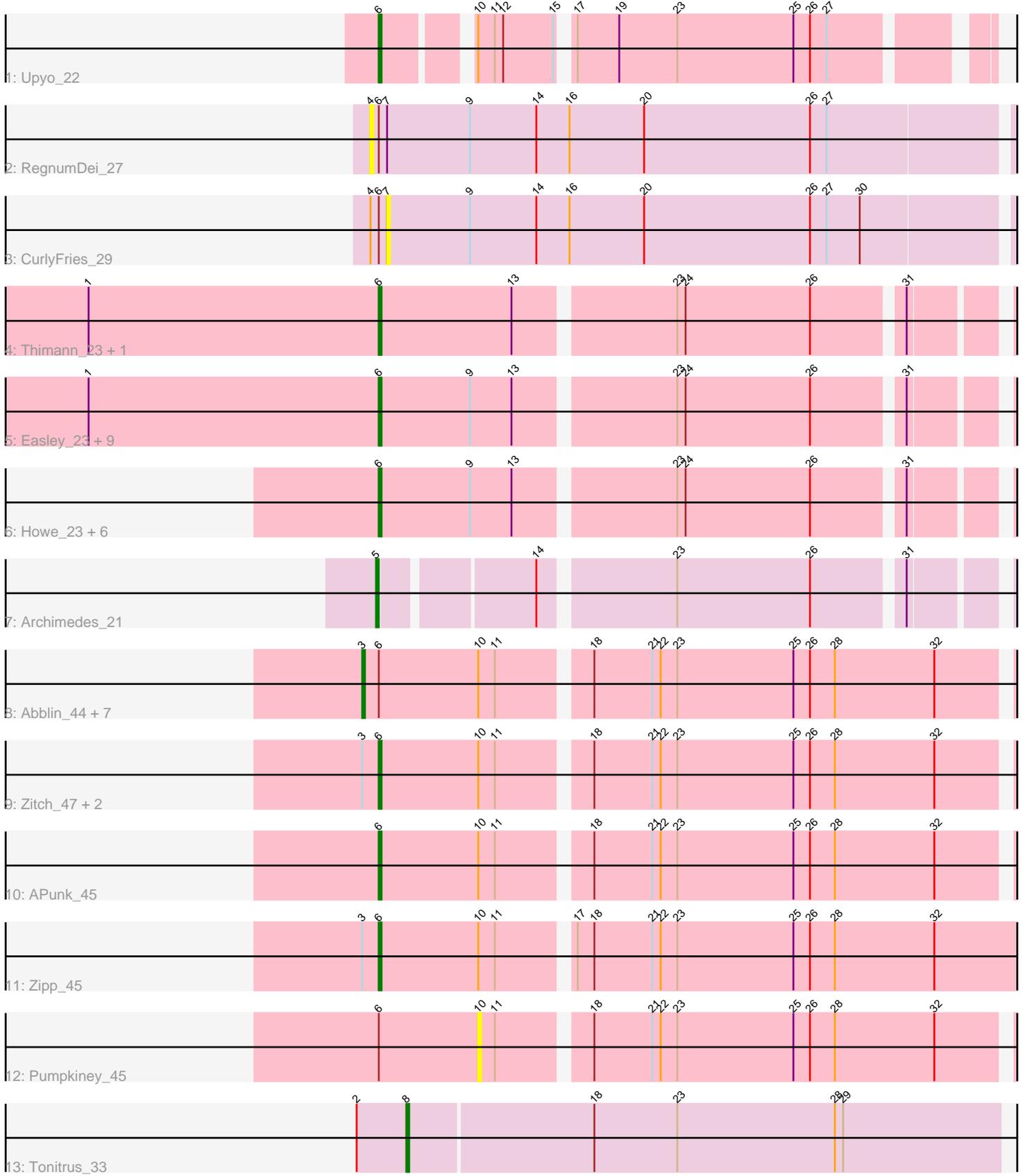


Pham 291336



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 291336 Report

This analysis was run 03/28/26 on database version 641.

Pham number 291336 has 38 members, 7 are drafts.

Phages represented in each track:

- Track 1 : Upyo_22
- Track 2 : RegnumDei_27
- Track 3 : CurlyFries_29
- Track 4 : Thimann_23, Suerte_21
- Track 5 : Easley_23, Dolores_23, MichaelScott_23, Sekhmet_23, Samman98_23, DobbysSock_22, WinkNick_23, Clark_23, Oregano_23, Annalisa_23
- Track 6 : Howe_23, Beenie_23, Twinkle_23, Shlim410_23, Mcklovin_23, Hortense_23, Adora_23
- Track 7 : Archimedes_21
- Track 8 : Abblin_44, Delrey21_44, Verity_44, Natkenzie_44, Tardus_45, BigHunkinEater_46, Scioto_45, DoctorFroggo_44
- Track 9 : Zitch_47, ViaConlectus_44, Sampson_44
- Track 10 : APunk_45
- Track 11 : Zipp_45
- Track 12 : Pumpkiney_45
- Track 13 : Tonitrus_33

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

The start number called the most often in the published annotations is 6, it was called in 25 of the 31 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- APunk_45, Adora_23, Annalisa_23, Beenie_23, Clark_23, DobbysSock_22, Dolores_23, Easley_23, Hortense_23, Howe_23, Mcklovin_23, MichaelScott_23, Oregano_23, Samman98_23, Sampson_44, Sekhmet_23, Shlim410_23, Suerte_21, Thimann_23, Twinkle_23, Upyo_22, ViaConlectus_44, WinkNick_23, Zipp_45, Zitch_47,

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

- Abblin_44, BigHunkinEater_46, CurlyFries_29, Delrey21_44, DoctorFroggo_44, Natkenzie_44, Pumpkiney_45, RegnumDei_27, Scioto_45, Tardus_45, Verity_44,

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

- Archimedes_21, Tonitrus_33,

Summary by start number:

Start 3:

- Found in 12 of 38 (31.6%) of genes in pham
- Manual Annotations of this start: 4 of 31
- Called 66.7% of time when present
- Phage (with cluster) where this start called: Abblin_44 (DE4), BigHunkinEater_46 (DE4), Delrey21_44 (DE4), DoctorFroggo_44 (DE4), Natkenzie_44 (DE4), Scioto_45 (DE4), Tardus_45 (DE4), Verity_44 (DE4),

Start 4:

- Found in 2 of 38 (5.3%) of genes in pham
- No Manual Annotations of this start.
- Called 50.0% of time when present
- Phage (with cluster) where this start called: RegnumDei_27 (CF),

Start 5:

- Found in 1 of 38 (2.6%) of genes in pham
- Manual Annotations of this start: 1 of 31
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Archimedes_21 (DA),

Start 6:

- Found in 36 of 38 (94.7%) of genes in pham
- Manual Annotations of this start: 25 of 31
- Called 69.4% of time when present
- Phage (with cluster) where this start called: APunk_45 (DE4), Adora_23 (CZ4), Annalisa_23 (CZ4), Beenie_23 (CZ4), Clark_23 (CZ4), DobbysSock_22 (CZ4), Dolores_23 (CZ4), Easley_23 (CZ4), Hortense_23 (CZ4), Howe_23 (CZ4), Mcklovin_23 (CZ4), MichaelScott_23 (CZ4), Oregano_23 (CZ4), Samman98_23 (CZ4), Sampson_44 (DE4), Sekhmet_23 (CZ4), Shlim410_23 (CZ4), Suerte_21 (CZ4), Thimann_23 (CZ4), Twinkle_23 (CZ4), Upyo_22 (CD), ViaConlectus_44 (DE4), WinkNick_23 (CZ4), Zipp_45 (DE4), Zitch_47 (DE4),

Start 7:

- Found in 2 of 38 (5.3%) of genes in pham
- No Manual Annotations of this start.
- Called 50.0% of time when present
- Phage (with cluster) where this start called: CurlyFries_29 (CF),

Start 8:

- Found in 1 of 38 (2.6%) of genes in pham
- Manual Annotations of this start: 1 of 31
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Tonitrus_33 (singleton),

Start 10:

- Found in 15 of 38 (39.5%) of genes in pham
- No Manual Annotations of this start.
- Called 6.7% of time when present
- Phage (with cluster) where this start called: Pumpkiney_45 (DE4),

Summary by clusters:

There are 6 clusters represented in this pham: singleton, DE4, CF, CZ4, CD, DA,

Info for manual annotations of cluster CD:

- Start number 6 was manually annotated 1 time for cluster CD.

Info for manual annotations of cluster CZ4:

- Start number 6 was manually annotated 19 times for cluster CZ4.

Info for manual annotations of cluster DA:

- Start number 5 was manually annotated 1 time for cluster DA.

Info for manual annotations of cluster DE4:

- Start number 3 was manually annotated 4 times for cluster DE4.
- Start number 6 was manually annotated 5 times for cluster DE4.

Gene Information:

Gene: APunk_45 Start: 39354, Stop: 39626, Start Num: 6

Candidate Starts for APunk_45:

(Start: 6 @39354 has 25 MA's), (10, 39390), (11, 39396), (18, 39426), (21, 39447), (22, 39450), (23, 39456), (25, 39498), (26, 39504), (28, 39513), (32, 39549),

Gene: Abblin_44 Start: 39885, Stop: 40163, Start Num: 3

Candidate Starts for Abblin_44:

(Start: 3 @39885 has 4 MA's), (Start: 6 @39891 has 25 MA's), (10, 39927), (11, 39933), (18, 39963), (21, 39984), (22, 39987), (23, 39993), (25, 40035), (26, 40041), (28, 40050), (32, 40086),

Gene: Adora_23 Start: 21051, Stop: 21284, Start Num: 6

Candidate Starts for Adora_23:

(Start: 6 @21051 has 25 MA's), (9, 21084), (13, 21099), (23, 21153), (24, 21156), (26, 21201), (31, 21231),

Gene: Annalisa_23 Start: 20513, Stop: 20746, Start Num: 6

Candidate Starts for Annalisa_23:

(1, 20408), (Start: 6 @20513 has 25 MA's), (9, 20546), (13, 20561), (23, 20615), (24, 20618), (26, 20663), (31, 20693),

Gene: Archimedes_21 Start: 19115, Stop: 19348, Start Num: 5

Candidate Starts for Archimedes_21:

(Start: 5 @19115 has 1 MA's), (14, 19166), (23, 19211), (26, 19259), (31, 19289),

Gene: Beenie_23 Start: 20870, Stop: 21103, Start Num: 6

Candidate Starts for Beenie_23:

(Start: 6 @20870 has 25 MA's), (9, 20903), (13, 20918), (23, 20972), (24, 20975), (26, 21020), (31, 21050),

Gene: BigHunkinEater_46 Start: 39126, Stop: 39404, Start Num: 3

Candidate Starts for BigHunkinEater_46:

(Start: 3 @39126 has 4 MA's), (Start: 6 @39132 has 25 MA's), (10, 39168), (11, 39174), (18, 39204), (21, 39225), (22, 39228), (23, 39234), (25, 39276), (26, 39282), (28, 39291), (32, 39327),

Gene: Clark_23 Start: 20513, Stop: 20746, Start Num: 6

Candidate Starts for Clark_23:

(1, 20408), (Start: 6 @20513 has 25 MA's), (9, 20546), (13, 20561), (23, 20615), (24, 20618), (26, 20663), (31, 20693),

Gene: CurlyFries_29 Start: 25359, Stop: 25610, Start Num: 7

Candidate Starts for CurlyFries_29:

(4, 25353), (Start: 6 @25356 has 25 MA's), (7, 25359), (9, 25389), (14, 25413), (16, 25425), (20, 25452), (26, 25512), (27, 25518), (30, 25530),

Gene: Delrey21_44 Start: 40650, Stop: 40928, Start Num: 3

Candidate Starts for Delrey21_44:

(Start: 3 @40650 has 4 MA's), (Start: 6 @40656 has 25 MA's), (10, 40692), (11, 40698), (18, 40728), (21, 40749), (22, 40752), (23, 40758), (25, 40800), (26, 40806), (28, 40815), (32, 40851),

Gene: DobbysSock_22 Start: 19987, Stop: 20220, Start Num: 6

Candidate Starts for DobbysSock_22:

(1, 19882), (Start: 6 @19987 has 25 MA's), (9, 20020), (13, 20035), (23, 20089), (24, 20092), (26, 20137), (31, 20167),

Gene: DoctorFroggo_44 Start: 40650, Stop: 40928, Start Num: 3

Candidate Starts for DoctorFroggo_44:

(Start: 3 @40650 has 4 MA's), (Start: 6 @40656 has 25 MA's), (10, 40692), (11, 40698), (18, 40728), (21, 40749), (22, 40752), (23, 40758), (25, 40800), (26, 40806), (28, 40815), (32, 40851),

Gene: Dolores_23 Start: 20489, Stop: 20722, Start Num: 6

Candidate Starts for Dolores_23:

(1, 20384), (Start: 6 @20489 has 25 MA's), (9, 20522), (13, 20537), (23, 20591), (24, 20594), (26, 20639), (31, 20669),

Gene: Easley_23 Start: 20499, Stop: 20732, Start Num: 6

Candidate Starts for Easley_23:

(1, 20394), (Start: 6 @20499 has 25 MA's), (9, 20532), (13, 20547), (23, 20601), (24, 20604), (26, 20649), (31, 20679),

Gene: Hortense_23 Start: 21098, Stop: 21331, Start Num: 6

Candidate Starts for Hortense_23:

(Start: 6 @21098 has 25 MA's), (9, 21131), (13, 21146), (23, 21200), (24, 21203), (26, 21248), (31, 21278),

Gene: Howe_23 Start: 21098, Stop: 21331, Start Num: 6

Candidate Starts for Howe_23:

(Start: 6 @21098 has 25 MA's), (9, 21131), (13, 21146), (23, 21200), (24, 21203), (26, 21248), (31, 21278),

Gene: Mcklovin_23 Start: 23267, Stop: 23500, Start Num: 6

Candidate Starts for Mcklovin_23:

(Start: 6 @23267 has 25 MA's), (9, 23300), (13, 23315), (23, 23369), (24, 23372), (26, 23417), (31, 23447),

Gene: MichaelScott_23 Start: 20870, Stop: 21103, Start Num: 6

Candidate Starts for MichaelScott_23:

(1, 20765), (Start: 6 @20870 has 25 MA's), (9, 20903), (13, 20918), (23, 20972), (24, 20975), (26, 21020), (31, 21050),

Gene: Natkenzie_44 Start: 39885, Stop: 40163, Start Num: 3

Candidate Starts for Natkenzie_44:

(Start: 3 @39885 has 4 MA's), (Start: 6 @39891 has 25 MA's), (10, 39927), (11, 39933), (18, 39963), (21, 39984), (22, 39987), (23, 39993), (25, 40035), (26, 40041), (28, 40050), (32, 40086),

Gene: Oregano_23 Start: 20535, Stop: 20768, Start Num: 6

Candidate Starts for Oregano_23:

(1, 20430), (Start: 6 @20535 has 25 MA's), (9, 20568), (13, 20583), (23, 20637), (24, 20640), (26, 20685), (31, 20715),

Gene: Pumpkiney_45 Start: 37248, Stop: 37484, Start Num: 10

Candidate Starts for Pumpkiney_45:

(Start: 6 @37212 has 25 MA's), (10, 37248), (11, 37254), (18, 37284), (21, 37305), (22, 37308), (23, 37314), (25, 37356), (26, 37362), (28, 37371), (32, 37407),

Gene: RegnumDei_27 Start: 26102, Stop: 26362, Start Num: 4

Candidate Starts for RegnumDei_27:

(4, 26102), (Start: 6 @26105 has 25 MA's), (7, 26108), (9, 26138), (14, 26162), (16, 26174), (20, 26201), (26, 26261), (27, 26267),

Gene: Samman98_23 Start: 20504, Stop: 20737, Start Num: 6

Candidate Starts for Samman98_23:

(1, 20399), (Start: 6 @20504 has 25 MA's), (9, 20537), (13, 20552), (23, 20606), (24, 20609), (26, 20654), (31, 20684),

Gene: Sampson_44 Start: 39836, Stop: 40108, Start Num: 6

Candidate Starts for Sampson_44:

(Start: 3 @39830 has 4 MA's), (Start: 6 @39836 has 25 MA's), (10, 39872), (11, 39878), (18, 39908), (21, 39929), (22, 39932), (23, 39938), (25, 39980), (26, 39986), (28, 39995), (32, 40031),

Gene: Scioto_45 Start: 39886, Stop: 40164, Start Num: 3

Candidate Starts for Scioto_45:

(Start: 3 @39886 has 4 MA's), (Start: 6 @39892 has 25 MA's), (10, 39928), (11, 39934), (18, 39964), (21, 39985), (22, 39988), (23, 39994), (25, 40036), (26, 40042), (28, 40051), (32, 40087),

Gene: Sekhmet_23 Start: 20864, Stop: 21097, Start Num: 6

Candidate Starts for Sekhmet_23:

(1, 20759), (Start: 6 @20864 has 25 MA's), (9, 20897), (13, 20912), (23, 20966), (24, 20969), (26, 21014), (31, 21044),

Gene: Shlim410_23 Start: 21098, Stop: 21331, Start Num: 6

Candidate Starts for Shlim410_23:

(Start: 6 @21098 has 25 MA's), (9, 21131), (13, 21146), (23, 21200), (24, 21203), (26, 21248), (31, 21278),

Gene: Suerte_21 Start: 19988, Stop: 20221, Start Num: 6

Candidate Starts for Suerte_21:

(1, 19883), (Start: 6 @19988 has 25 MA's), (13, 20036), (23, 20090), (24, 20093), (26, 20138), (31, 20168),

Gene: Tardus_45 Start: 39240, Stop: 39518, Start Num: 3

Candidate Starts for Tardus_45:

(Start: 3 @39240 has 4 MA's), (Start: 6 @39246 has 25 MA's), (10, 39282), (11, 39288), (18, 39318), (21, 39339), (22, 39342), (23, 39348), (25, 39390), (26, 39396), (28, 39405), (32, 39441),

Gene: Thimann_23 Start: 20456, Stop: 20689, Start Num: 6

Candidate Starts for Thimann_23:

(1, 20351), (Start: 6 @20456 has 25 MA's), (13, 20504), (23, 20558), (24, 20561), (26, 20606), (31, 20636),

Gene: Tonitrus_33 Start: 22454, Stop: 22666, Start Num: 8

Candidate Starts for Tonitrus_33:

(2, 22436), (Start: 8 @22454 has 1 MA's), (18, 22520), (23, 22550), (28, 22607), (29, 22610),

Gene: Twinkle_23 Start: 22157, Stop: 22390, Start Num: 6

Candidate Starts for Twinkle_23:

(Start: 6 @22157 has 25 MA's), (9, 22190), (13, 22205), (23, 22259), (24, 22262), (26, 22307), (31, 22337),

Gene: Upyo_22 Start: 18567, Stop: 18791, Start Num: 6

Candidate Starts for Upyo_22:

(Start: 6 @18567 has 25 MA's), (10, 18594), (11, 18600), (12, 18603), (15, 18621), (17, 18624), (19, 18639), (23, 18660), (25, 18702), (26, 18708), (27, 18714),

Gene: Verity_44 Start: 40650, Stop: 40928, Start Num: 3

Candidate Starts for Verity_44:

(Start: 3 @40650 has 4 MA's), (Start: 6 @40656 has 25 MA's), (10, 40692), (11, 40698), (18, 40728), (21, 40749), (22, 40752), (23, 40758), (25, 40800), (26, 40806), (28, 40815), (32, 40851),

Gene: ViaConlectus_44 Start: 38526, Stop: 38798, Start Num: 6

Candidate Starts for ViaConlectus_44:

(Start: 3 @38520 has 4 MA's), (Start: 6 @38526 has 25 MA's), (10, 38562), (11, 38568), (18, 38598), (21, 38619), (22, 38622), (23, 38628), (25, 38670), (26, 38676), (28, 38685), (32, 38721),

Gene: WinkNick_23 Start: 20489, Stop: 20722, Start Num: 6

Candidate Starts for WinkNick_23:

(1, 20384), (Start: 6 @20489 has 25 MA's), (9, 20522), (13, 20537), (23, 20591), (24, 20594), (26, 20639), (31, 20669),

Gene: Zipp_45 Start: 40565, Stop: 40843, Start Num: 6

Candidate Starts for Zipp_45:

(Start: 3 @40559 has 4 MA's), (Start: 6 @40565 has 25 MA's), (10, 40601), (11, 40607), (17, 40631), (18, 40637), (21, 40658), (22, 40661), (23, 40667), (25, 40709), (26, 40715), (28, 40724), (32, 40760),

Gene: Zitch_47 Start: 38681, Stop: 38953, Start Num: 6

Candidate Starts for Zitch_47:

(Start: 3 @38675 has 4 MA's), (Start: 6 @38681 has 25 MA's), (10, 38717), (11, 38723), (18, 38753), (21, 38774), (22, 38777), (23, 38783), (25, 38825), (26, 38831), (28, 38840), (32, 38876),