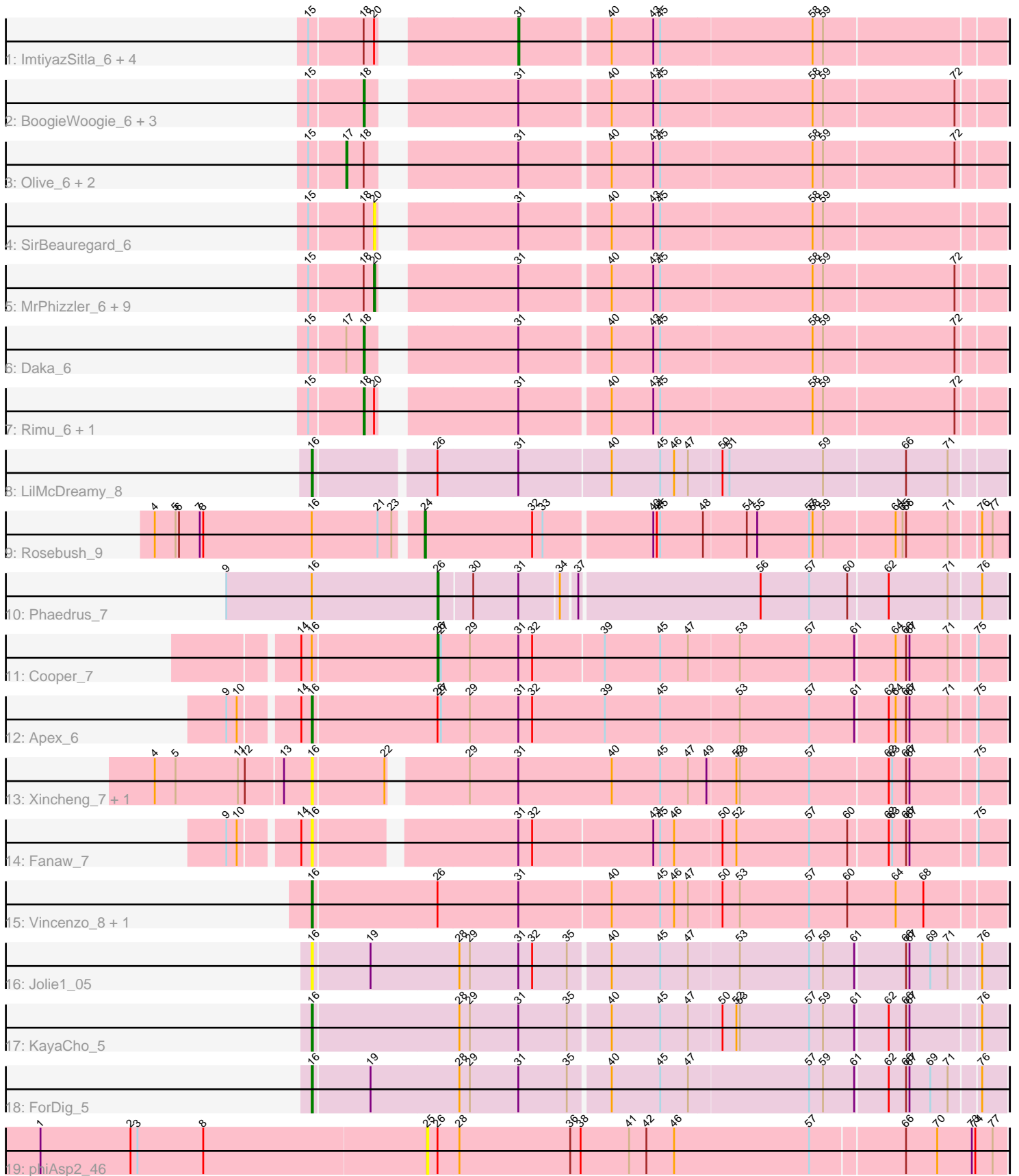


Pham 305143



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 305143 Report

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

Pham number 305143 has 40 members, 14 are drafts.

Phages represented in each track:

- Track 1 : ImtiyazSitla_6, Maskar_6, Chuni_6, Etaye_6, Ashraf_6
- Track 2 : BoogieWoogie_6, Prickles_6, FluffyNinja_6, Lehmann_7
- Track 3 : Olive_6, JacAttac_6, FremontTroll_7
- Track 4 : SirBeauregard_6
- Track 5 : MrPhizzler_6, Andre_6, Taraxa_6, Charles1_6, Thunderbird_6, Karn_6, Katniss_6, Khan1_6, Swiphy_6, Schueller_6
- Track 6 : Daka_6
- Track 7 : Rimu_6, SallyH_7
- Track 8 : LilMcDreamy_8
- Track 9 : Rosebush_9
- Track 10 : Phaedruss_7
- Track 11 : Cooper_7
- Track 12 : Apex_6
- Track 13 : Xincheng_7, JaguarMi_7
- Track 14 : Fanaw_7
- Track 15 : Vincenzo_8, AlanGrant_8
- Track 16 : Jolie1_05
- Track 17 : KayaCho_5
- Track 18 : ForDig_5
- Track 19 : phiAsp2_46

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

The start number called the most often in the published annotations is 20, it was called in 7 of the 26 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Andre_6, Charles1_6, Karn_6, Katniss_6, Khan1_6, MrPhizzler_6, Schueller_6, SirBeauregard_6, Swiphy_6, Taraxa_6, Thunderbird_6,

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

- Ashraf_6, Chuni_6, Etaye_6, ImtiyazSitla_6, Maskar_6, Rimu_6, SallyH_7,

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

- AlanGrant_8, Apex_6, BoogieWoogie_6, Cooper_7, Daka_6, Fanaw_7, FluffyNinja_6, ForDig_5, FremontTroll_7, JacAttac_6, JaguarMi_7, Jolie1_05, KayaCho_5, Lehmann_7, LilMcDreamy_8, Olive_6, Phaedrus_7, Prickles_6, Rosebush_9, Vincenzo_8, Xincheng_7, phiAsp2_46,

Summary by start number:

Start 16:

- Found in 13 of 40 (32.5%) of genes in pham
- Manual Annotations of this start: 6 of 26
- Called 76.9% of time when present
- Phage (with cluster) where this start called: AlanGrant_8 (B4), Apex_6 (B4), Fanaw_7 (B4), ForDig_5 (B6), JaguarMi_7 (B4), Jolie1_05 (B6), KayaCho_5 (B6), LilMcDreamy_8 (B12), Vincenzo_8 (B4), Xincheng_7 (B4),

Start 17:

- Found in 4 of 40 (10.0%) of genes in pham
- Manual Annotations of this start: 2 of 26
- Called 75.0% of time when present
- Phage (with cluster) where this start called: FremontTroll_7 (B1), JacAttac_6 (B1), Olive_6 (B1),

Start 18:

- Found in 26 of 40 (65.0%) of genes in pham
- Manual Annotations of this start: 4 of 26
- Called 26.9% of time when present
- Phage (with cluster) where this start called: BoogieWoogie_6 (B1), Daka_6 (B1), FluffyNinja_6 (B1), Lehmann_7 (B1), Prickles_6 (B1), Rimu_6 (B1), SallyH_7 (B1),

Start 20:

- Found in 18 of 40 (45.0%) of genes in pham
- Manual Annotations of this start: 7 of 26
- Called 61.1% of time when present
- Phage (with cluster) where this start called: Andre_6 (B1), Charles1_6 (B1), Karn_6 (B1), Katniss_6 (B1), Khan1_6 (B1), MrPhizzler_6 (B1), Schueller_6 (B1), SirBeauregard_6 (B1), Swiphy_6 (B1), Taraxa_6 (B1), Thunderbird_6 (B1),

Start 24:

- Found in 1 of 40 (2.5%) of genes in pham
- Manual Annotations of this start: 1 of 26
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Rosebush_9 (B2),

Start 25:

- Found in 1 of 40 (2.5%) of genes in pham
- No Manual Annotations of this start.
- Called 100.0% of time when present
- Phage (with cluster) where this start called: phiAsp2_46 (singleton),

Start 26:

- Found in 7 of 40 (17.5%) of genes in pham
- Manual Annotations of this start: 2 of 26
- Called 28.6% of time when present

- Phage (with cluster) where this start called: Cooper_7 (B4), Phaedrus_7 (B3),

Start 31:

- Found in 38 of 40 (95.0%) of genes in pham
- Manual Annotations of this start: 4 of 26
- Called 13.2% of time when present
- Phage (with cluster) where this start called: Ashraf_6 (B1), Chuni_6 (B1), Etaye_6 (B1), ImtiyazSitla_6 (B1), Maskar_6 (B1),

Summary by clusters:

There are 7 clusters represented in this pham: singleton, B4, B6, B12, B1, B2, B3,

Info for manual annotations of cluster B1:

- Start number 17 was manually annotated 2 times for cluster B1.
- Start number 18 was manually annotated 4 times for cluster B1.
- Start number 20 was manually annotated 7 times for cluster B1.
- Start number 31 was manually annotated 4 times for cluster B1.

Info for manual annotations of cluster B12:

- Start number 16 was manually annotated 1 time for cluster B12.

Info for manual annotations of cluster B2:

- Start number 24 was manually annotated 1 time for cluster B2.

Info for manual annotations of cluster B3:

- Start number 26 was manually annotated 1 time for cluster B3.

Info for manual annotations of cluster B4:

- Start number 16 was manually annotated 3 times for cluster B4.
- Start number 26 was manually annotated 1 time for cluster B4.

Info for manual annotations of cluster B6:

- Start number 16 was manually annotated 2 times for cluster B6.

Gene Information:

Gene: AlanGrant_8 Start: 6947, Stop: 6363, Start Num: 16

Candidate Starts for AlanGrant_8:

(Start: 16 @6947 has 6 MA's), (Start: 26 @6842 has 2 MA's), (Start: 31 @6773 has 4 MA's), (40, 6695), (45, 6653), (46, 6641), (47, 6629), (50, 6602), (53, 6587), (57, 6527), (60, 6494), (64, 6452), (68, 6428),

Gene: Andre_6 Start: 3865, Stop: 3365, Start Num: 20

Candidate Starts for Andre_6:

(15, 3919), (Start: 18 @3874 has 4 MA's), (Start: 20 @3865 has 7 MA's), (Start: 31 @3769 has 4 MA's), (40, 3694), (43, 3658), (45, 3652), (58, 3523), (59, 3514), (72, 3403),

Gene: Apex_6 Start: 5787, Stop: 5203, Start Num: 16

Candidate Starts for Apex_6:

(9, 5847), (10, 5838), (14, 5796), (Start: 16 @5787 has 6 MA's), (Start: 26 @5682 has 2 MA's), (27, 5679), (29, 5655), (Start: 31 @5613 has 4 MA's), (32, 5601), (39, 5538), (45, 5490), (53, 5424), (57, 5364), (61, 5325), (62, 5298), (64, 5292), (66, 5283), (67, 5280), (71, 5247), (75, 5226),

Gene: Ashraf_6 Start: 3765, Stop: 3361, Start Num: 31

Candidate Starts for Ashraf_6:

(15, 3915), (Start: 18 @3870 has 4 MA's), (Start: 20 @3861 has 7 MA's), (Start: 31 @3765 has 4 MA's), (40, 3690), (43, 3654), (45, 3648), (58, 3519), (59, 3510),

Gene: BoogieWoogie_6 Start: 3870, Stop: 3361, Start Num: 18

Candidate Starts for BoogieWoogie_6:

(15, 3915), (Start: 18 @3870 has 4 MA's), (Start: 31 @3765 has 4 MA's), (40, 3690), (43, 3654), (45, 3648), (58, 3519), (59, 3510), (72, 3399),

Gene: Charles1_6 Start: 3864, Stop: 3364, Start Num: 20

Candidate Starts for Charles1_6:

(15, 3918), (Start: 18 @3873 has 4 MA's), (Start: 20 @3864 has 7 MA's), (Start: 31 @3768 has 4 MA's), (40, 3693), (43, 3657), (45, 3651), (58, 3522), (59, 3513), (72, 3402),

Gene: Chuni_6 Start: 3766, Stop: 3362, Start Num: 31

Candidate Starts for Chuni_6:

(15, 3916), (Start: 18 @3871 has 4 MA's), (Start: 20 @3862 has 7 MA's), (Start: 31 @3766 has 4 MA's), (40, 3691), (43, 3655), (45, 3649), (58, 3520), (59, 3511),

Gene: Cooper_7 Start: 5099, Stop: 4623, Start Num: 26

Candidate Starts for Cooper_7:

(14, 5213), (Start: 16 @5204 has 6 MA's), (Start: 26 @5099 has 2 MA's), (27, 5096), (29, 5072), (Start: 31 @5030 has 4 MA's), (32, 5018), (39, 4958), (45, 4910), (47, 4886), (53, 4844), (57, 4784), (61, 4745), (64, 4712), (66, 4703), (67, 4700), (71, 4667), (75, 4646),

Gene: Daka_6 Start: 3876, Stop: 3367, Start Num: 18

Candidate Starts for Daka_6:

(15, 3921), (Start: 17 @3891 has 2 MA's), (Start: 18 @3876 has 4 MA's), (Start: 31 @3771 has 4 MA's), (40, 3696), (43, 3660), (45, 3654), (58, 3525), (59, 3516), (72, 3405),

Gene: Etaye_6 Start: 3765, Stop: 3361, Start Num: 31

Candidate Starts for Etaye_6:

(15, 3915), (Start: 18 @3870 has 4 MA's), (Start: 20 @3861 has 7 MA's), (Start: 31 @3765 has 4 MA's), (40, 3690), (43, 3654), (45, 3648), (58, 3519), (59, 3510),

Gene: Fanaw_7 Start: 6243, Stop: 5680, Start Num: 16

Candidate Starts for Fanaw_7:

(9, 6303), (10, 6294), (14, 6252), (Start: 16 @6243 has 6 MA's), (Start: 31 @6087 has 4 MA's), (32, 6075), (43, 5973), (45, 5967), (46, 5955), (50, 5916), (52, 5904), (57, 5841), (60, 5808), (62, 5775), (63, 5772), (66, 5760), (67, 5757), (75, 5703),

Gene: FluffyNinja_6 Start: 3871, Stop: 3362, Start Num: 18

Candidate Starts for FluffyNinja_6:

(15, 3916), (Start: 18 @3871 has 4 MA's), (Start: 31 @3766 has 4 MA's), (40, 3691), (43, 3655), (45, 3649), (58, 3520), (59, 3511), (72, 3400),

Gene: ForDig_5 Start: 4719, Stop: 4141, Start Num: 16

Candidate Starts for ForDig_5:

(Start: 16 @4719 has 6 MA's), (19, 4671), (28, 4596), (29, 4587), (Start: 31 @4545 has 4 MA's), (35, 4503), (40, 4470), (45, 4428), (47, 4404), (57, 4302), (59, 4290), (61, 4263), (62, 4236), (66, 4221), (67, 4218), (69, 4200), (71, 4185), (76, 4161),

Gene: FremontTroll_7 Start: 3886, Stop: 3362, Start Num: 17

Candidate Starts for FremontTroll_7:

(15, 3916), (Start: 17 @3886 has 2 MA's), (Start: 18 @3871 has 4 MA's), (Start: 31 @3766 has 4 MA's), (40, 3691), (43, 3655), (45, 3649), (58, 3520), (59, 3511), (72, 3400),

Gene: ImtiyazSitla_6 Start: 3765, Stop: 3361, Start Num: 31

Candidate Starts for ImtiyazSitla_6:

(15, 3915), (Start: 18 @3870 has 4 MA's), (Start: 20 @3861 has 7 MA's), (Start: 31 @3765 has 4 MA's), (40, 3690), (43, 3654), (45, 3648), (58, 3519), (59, 3510),

Gene: JacAttac_6 Start: 3885, Stop: 3361, Start Num: 17

Candidate Starts for JacAttac_6:

(15, 3915), (Start: 17 @3885 has 2 MA's), (Start: 18 @3870 has 4 MA's), (Start: 31 @3765 has 4 MA's), (40, 3690), (43, 3654), (45, 3648), (58, 3519), (59, 3510), (72, 3399),

Gene: JaguarMi_7 Start: 5906, Stop: 5340, Start Num: 16

Candidate Starts for JaguarMi_7:

(4, 6038), (5, 6020), (11, 5966), (12, 5960), (13, 5930), (Start: 16 @5906 has 6 MA's), (22, 5846), (29, 5792), (Start: 31 @5750 has 4 MA's), (40, 5669), (45, 5627), (47, 5603), (49, 5588), (52, 5564), (53, 5561), (57, 5501), (62, 5435), (63, 5432), (66, 5420), (67, 5417), (75, 5363),

Gene: Jolie1_05 Start: 4719, Stop: 4141, Start Num: 16

Candidate Starts for Jolie1_05:

(Start: 16 @4719 has 6 MA's), (19, 4671), (28, 4596), (29, 4587), (Start: 31 @4545 has 4 MA's), (32, 4533), (35, 4503), (40, 4470), (45, 4428), (47, 4404), (53, 4362), (57, 4302), (59, 4290), (61, 4263), (66, 4221), (67, 4218), (69, 4200), (71, 4185), (76, 4161),

Gene: Karn_6 Start: 3863, Stop: 3363, Start Num: 20

Candidate Starts for Karn_6:

(15, 3917), (Start: 18 @3872 has 4 MA's), (Start: 20 @3863 has 7 MA's), (Start: 31 @3767 has 4 MA's), (40, 3692), (43, 3656), (45, 3650), (58, 3521), (59, 3512), (72, 3401),

Gene: Katniss_6 Start: 3865, Stop: 3365, Start Num: 20

Candidate Starts for Katniss_6:

(15, 3919), (Start: 18 @3874 has 4 MA's), (Start: 20 @3865 has 7 MA's), (Start: 31 @3769 has 4 MA's), (40, 3694), (43, 3658), (45, 3652), (58, 3523), (59, 3514), (72, 3403),

Gene: KayaCho_5 Start: 4722, Stop: 4144, Start Num: 16

Candidate Starts for KayaCho_5:

(Start: 16 @4722 has 6 MA's), (28, 4599), (29, 4590), (Start: 31 @4548 has 4 MA's), (35, 4506), (40, 4473), (45, 4431), (47, 4407), (50, 4380), (52, 4368), (53, 4365), (57, 4305), (59, 4293), (61, 4266), (62, 4239), (66, 4224), (67, 4221), (76, 4164),

Gene: Khan1_6 Start: 3863, Stop: 3363, Start Num: 20

Candidate Starts for Khan1_6:

(15, 3917), (Start: 18 @3872 has 4 MA's), (Start: 20 @3863 has 7 MA's), (Start: 31 @3767 has 4 MA's), (40, 3692), (43, 3656), (45, 3650), (58, 3521), (59, 3512), (72, 3401),

Gene: Lehmann_7 Start: 3873, Stop: 3364, Start Num: 18

Candidate Starts for Lehmann_7:

(15, 3918), (Start: 18 @3873 has 4 MA's), (Start: 31 @3768 has 4 MA's), (40, 3693), (43, 3657), (45, 3651), (58, 3522), (59, 3513), (72, 3402),

Gene: LilMcDreamy_8 Start: 6993, Stop: 6421, Start Num: 16

Candidate Starts for LilMcDreamy_8:

(Start: 16 @6993 has 6 MA's), (Start: 26 @6897 has 2 MA's), (Start: 31 @6828 has 4 MA's), (40, 6750), (45, 6708), (46, 6696), (47, 6684), (50, 6657), (51, 6651), (59, 6570), (66, 6501), (71, 6465),

Gene: Maskar_6 Start: 3765, Stop: 3361, Start Num: 31

Candidate Starts for Maskar_6:

(15, 3915), (Start: 18 @3870 has 4 MA's), (Start: 20 @3861 has 7 MA's), (Start: 31 @3765 has 4 MA's), (40, 3690), (43, 3654), (45, 3648), (58, 3519), (59, 3510),

Gene: MrPhizzler_6 Start: 3860, Stop: 3360, Start Num: 20

Candidate Starts for MrPhizzler_6:

(15, 3914), (Start: 18 @3869 has 4 MA's), (Start: 20 @3860 has 7 MA's), (Start: 31 @3764 has 4 MA's), (40, 3689), (43, 3653), (45, 3647), (58, 3518), (59, 3509), (72, 3398),

Gene: Olive_6 Start: 3885, Stop: 3361, Start Num: 17

Candidate Starts for Olive_6:

(15, 3915), (Start: 17 @3885 has 2 MA's), (Start: 18 @3870 has 4 MA's), (Start: 31 @3765 has 4 MA's), (40, 3690), (43, 3654), (45, 3648), (58, 3519), (59, 3510), (72, 3399),

Gene: Phaedrus_7 Start: 5222, Stop: 4752, Start Num: 26

Candidate Starts for Phaedrus_7:

(9, 5402), (Start: 16 @5330 has 6 MA's), (Start: 26 @5222 has 2 MA's), (30, 5195), (Start: 31 @5156 has 4 MA's), (34, 5123), (37, 5111), (56, 4958), (57, 4916), (60, 4883), (62, 4850), (71, 4799), (76, 4772),

Gene: Prickles_6 Start: 3879, Stop: 3370, Start Num: 18

Candidate Starts for Prickles_6:

(15, 3924), (Start: 18 @3879 has 4 MA's), (Start: 31 @3774 has 4 MA's), (40, 3699), (43, 3663), (45, 3657), (58, 3528), (59, 3519), (72, 3408),

Gene: Rimu_6 Start: 3869, Stop: 3360, Start Num: 18

Candidate Starts for Rimu_6:

(15, 3914), (Start: 18 @3869 has 4 MA's), (Start: 20 @3860 has 7 MA's), (Start: 31 @3764 has 4 MA's), (40, 3689), (43, 3653), (45, 3647), (58, 3518), (59, 3509), (72, 3398),

Gene: Rosebush_9 Start: 6678, Stop: 7166, Start Num: 24

Candidate Starts for Rosebush_9:

(4, 6456), (5, 6474), (6, 6477), (7, 6495), (8, 6498), (Start: 16 @6591 has 6 MA's), (21, 6648), (23, 6660), (Start: 24 @6678 has 1 MA's), (32, 6771), (33, 6780), (43, 6870), (44, 6873), (45, 6876), (48, 6912), (54, 6948), (55, 6957), (57, 7002), (58, 7005), (59, 7014), (64, 7074), (65, 7080), (66, 7083), (71, 7119), (76, 7143), (77, 7152),

Gene: SallyH_7 Start: 3871, Stop: 3362, Start Num: 18

Candidate Starts for SallyH_7:

(15, 3916), (Start: 18 @3871 has 4 MA's), (Start: 20 @3862 has 7 MA's), (Start: 31 @3766 has 4 MA's), (40, 3691), (43, 3655), (45, 3649), (58, 3520), (59, 3511), (72, 3400),

Gene: Schueller_6 Start: 3864, Stop: 3364, Start Num: 20

Candidate Starts for Schueller_6:

(15, 3918), (Start: 18 @3873 has 4 MA's), (Start: 20 @3864 has 7 MA's), (Start: 31 @3768 has 4 MA's), (40, 3693), (43, 3657), (45, 3651), (58, 3522), (59, 3513), (72, 3402),

Gene: SirBeauregard_6 Start: 3862, Stop: 3362, Start Num: 20

Candidate Starts for SirBeauregard_6:

(15, 3916), (Start: 18 @3871 has 4 MA's), (Start: 20 @3862 has 7 MA's), (Start: 31 @3766 has 4 MA's), (40, 3691), (43, 3655), (45, 3649), (58, 3520), (59, 3511),

Gene: Swiphy_6 Start: 3864, Stop: 3364, Start Num: 20

Candidate Starts for Swiphy_6:

(15, 3918), (Start: 18 @3873 has 4 MA's), (Start: 20 @3864 has 7 MA's), (Start: 31 @3768 has 4 MA's), (40, 3693), (43, 3657), (45, 3651), (58, 3522), (59, 3513), (72, 3402),

Gene: Taraxa_6 Start: 3863, Stop: 3363, Start Num: 20

Candidate Starts for Taraxa_6:

(15, 3917), (Start: 18 @3872 has 4 MA's), (Start: 20 @3863 has 7 MA's), (Start: 31 @3767 has 4 MA's), (40, 3692), (43, 3656), (45, 3650), (58, 3521), (59, 3512), (72, 3401),

Gene: Thunderbird_6 Start: 3863, Stop: 3363, Start Num: 20

Candidate Starts for Thunderbird_6:

(15, 3917), (Start: 18 @3872 has 4 MA's), (Start: 20 @3863 has 7 MA's), (Start: 31 @3767 has 4 MA's), (40, 3692), (43, 3656), (45, 3650), (58, 3521), (59, 3512), (72, 3401),

Gene: Vincenzo_8 Start: 6947, Stop: 6363, Start Num: 16

Candidate Starts for Vincenzo_8:

(Start: 16 @6947 has 6 MA's), (Start: 26 @6842 has 2 MA's), (Start: 31 @6773 has 4 MA's), (40, 6695), (45, 6653), (46, 6641), (47, 6629), (50, 6602), (53, 6587), (57, 6527), (60, 6494), (64, 6452), (68, 6428),

Gene: Xincheng_7 Start: 5906, Stop: 5340, Start Num: 16

Candidate Starts for Xincheng_7:

(4, 6038), (5, 6020), (11, 5966), (12, 5960), (13, 5930), (Start: 16 @5906 has 6 MA's), (22, 5846), (29, 5792), (Start: 31 @5750 has 4 MA's), (40, 5669), (45, 5627), (47, 5603), (49, 5588), (52, 5564), (53, 5561), (57, 5501), (62, 5435), (63, 5432), (66, 5420), (67, 5417), (75, 5363),

Gene: phiAsp2_46 Start: 36920, Stop: 37414, Start Num: 25

Candidate Starts for phiAsp2_46:

(1, 36587), (2, 36665), (3, 36671), (8, 36728), (25, 36920), (Start: 26 @36929 has 2 MA's), (28, 36947), (36, 37043), (38, 37052), (41, 37094), (42, 37109), (46, 37133), (57, 37250), (66, 37328), (70, 37355), (73, 37385), (74, 37388), (77, 37403),