ภาคผนวก

ภาคผนวก ก
คู่มือการใช้โปรแกรมทำนายยีนด้วยวิธี Fickett

โปรแกรมทำนายยีนด้วยวิธี Fickett พัฒนาโปรแกรมขึ้นใหม่โดยใช้หลักการของ Fickett J.W. (1982) โดยเครื่องมือที่ใช้พัฒนาโปรแกรมคือภาษา R version 2.2.0 โดยใช้ สายลำดับดีเอ็นเอ จีโนมของแบคทีเรียเป็นข้อมูลในการทดลอง ซึ่งแบ่งเป็นสายลำดับเบสย่อย ๆ ที่เรียกว่า contig จำนวน 385 ไฟล์ อยู่ในโฟลเดอร์ contig โดยขั้นตอนการใช้งานโปรแกรมมีดังนี้
1. เปิดโปรแกรม R version 2.2.0 ขึ้นมา หลังจากนั้นเปิด script สำหรับทำนายตำแหน่งยีน โดย สามารถเลือกได้ 3 ไฟล์ คือ ไฟล์ Code_FickettNormalFinal.R เพื่อทำนายโดยอ่านสายลำดับเบสวิธี Normal ไฟล์ Code_FickettBackFinal.R เพื่อทำนายโดยอ่านสายลำดับเบสวิธี Complement และ ไฟล์ Code_FickettReBackFinal.R เพื่อทำนายโดยอ่านสายลำดับเบสวิธี Translate Complement
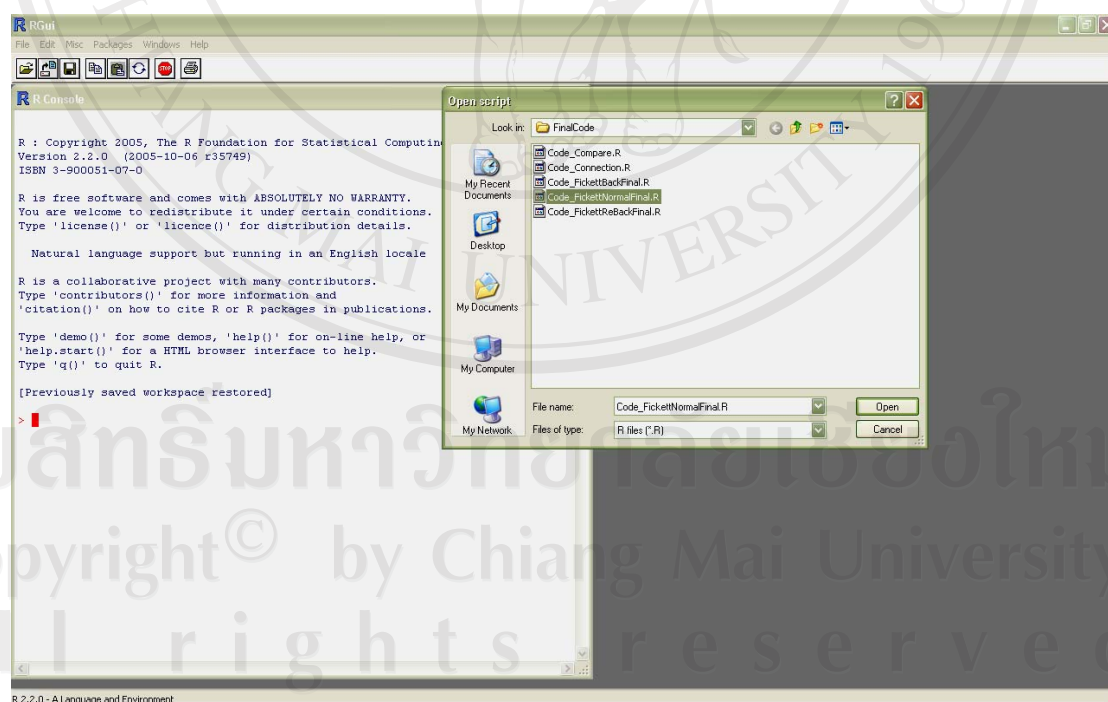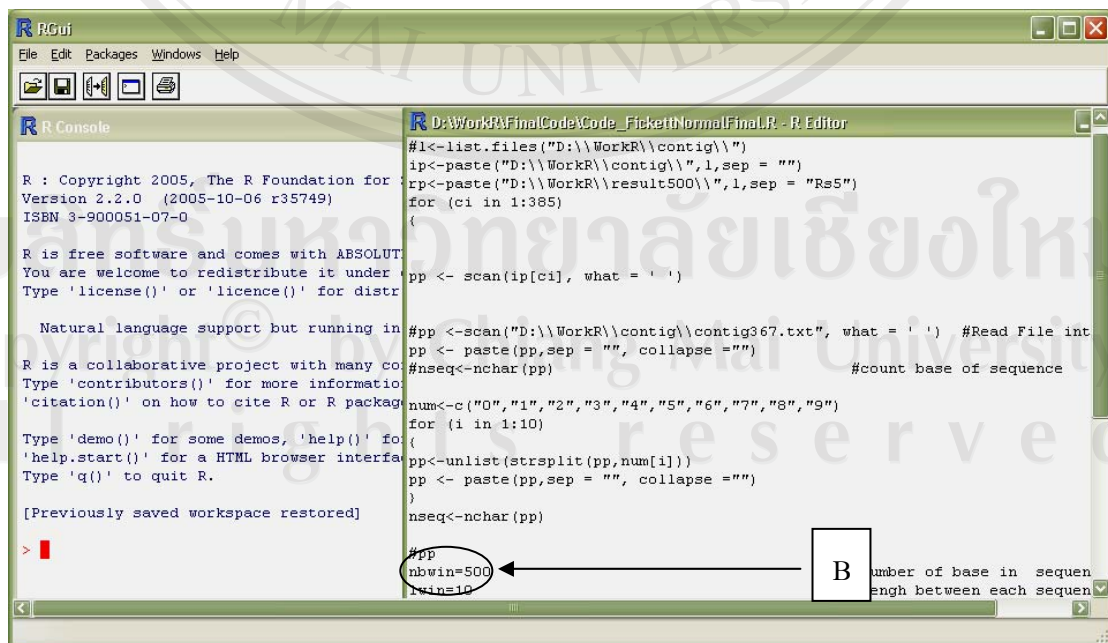

รูป ก.1 การเปิด script ในโปรแกรม R version 2.2.0

2. กำหนด input path ซึ่งหมายถึง path ของข้อมูลที่ต้องการนำมาทำนาย ให้ตัวแปร ip และ result path ซึ่งหมายถึง path ที่ต้องการให้นำผลการทำนายไปเก็บไว้ ให้ตัวแปร rp ที่ตำแหน่งที่ A

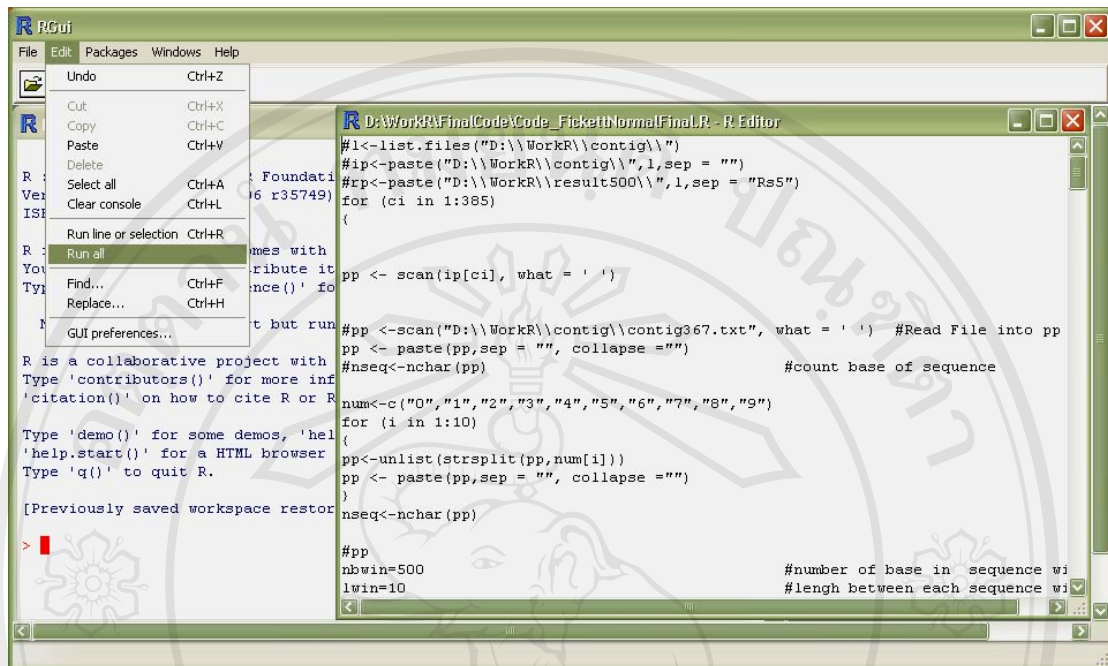
รูป ก.2 การกำหนดค่าให้ตัวแปร ip และ rp

3. กำหนด windows size ที่ต้องการ ให้ตัวแปร nbwin ที่ตำแหน่ง B

รูป ก.3 การกำหนดค่าให้ตัวแปร nbwin

4. เลือกคลิกเมนู Edit เลือก Run all

รูป ก.4 การ Run script ในโปรแกรม R version 2.2.0

5. เมื่อโปรแกรมทำงานเรียบร้อย ผลการทำนายจะไปอยู่ในโฟลเดอร์ที่ได้กำหนดไว้ข้างต้น โดย
ตัวอย่างผลการทำนายแต่ละไฟล์แสดงที่ตำแหน่ง C
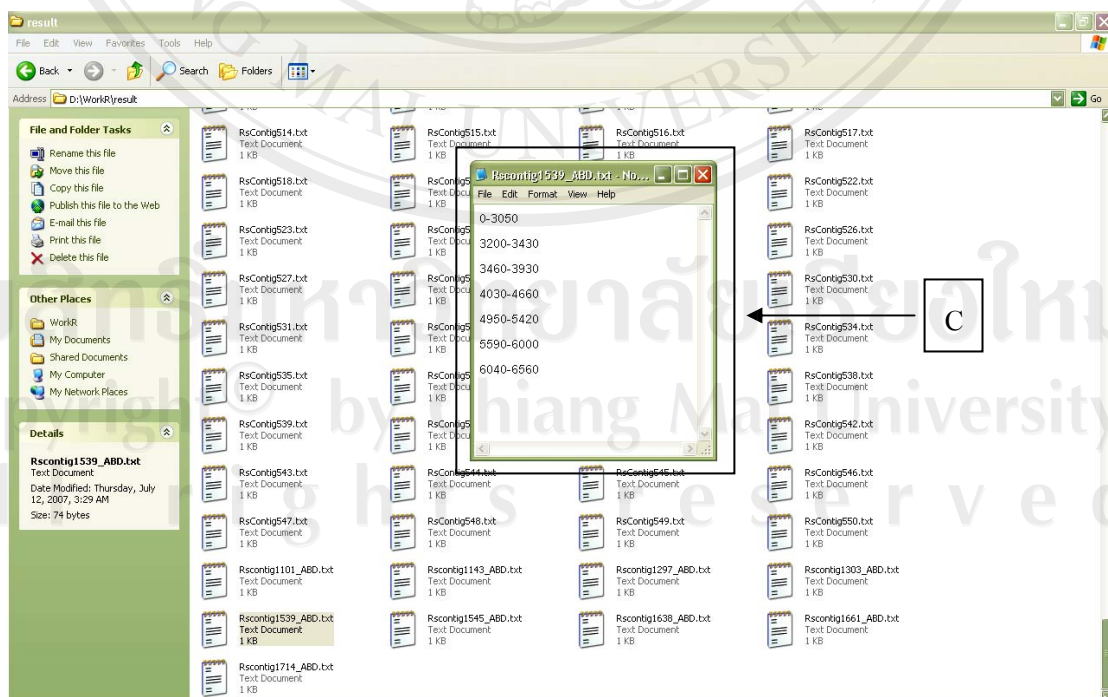
รูป ก.5 ตัวอย่างผลการทำนายแต่ละไฟล์

6. เปิด script ชื่อ Code_Connection.R เพื่อกำหนด path ของผลการทำนายที่ต้องการนำมา
เปรียบเทียบ โดยตำแหน่ง D ตัวแปร gp คือ path ของผลการทำนายจากโปรแกรม Glimmer และ
ตำแหน่ง E ตัวแปร cp คือ path ของผลการทำนายจากโปรแกรม Fickett แล้วเลือก run เฉพาะ
บรรทัดที่ได้กำหนดค่าให้ตัวแปร gp และ cp

รูป ก.6 การกำหนดค่าให้ตัวแปร gp และ cp

7. เปิด script ชื่อ Code_Compare.R แล้วคลิกเมนู Edit เลือก Run all เพื่อทำการเปรียบเทียบผลการ
ทำนายของโปรแกรม Fickett และ Glimmer

8. เปิด script ชื่อ Code_ConclusionResult.R เพื่อนำผลการเปรียบเทียบที่ได้จากข้อ 7. ไปสรุปเป็น
ตารางแสดงค่า found, under และ over ของผลการทำนายจากโปรแกรม Fickett และ Glimmer ซึ่ง
แสดงในภาคผนวก ข และ ตาราง 5.3 เปรียบเทียบจำนวนข้อมูลของผลการทำนาย

ภาคผนวก ข

ตารางแสดงค่า found, under และ over ของผลการทำนายจากโปรแกรม
Fickett และ Glimmer

ตารางแสดงค่า found, under และ over ของผลการทำนายจากโปรแกรม Fickett และ Glimmer โดย
อ่านสายลำดับเบสวิธี Normal

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig106	Fickett found Glimmer not found			Both not found		
Contig110	79.08%	20.73%	0.19%	47.79%	32.41%	19.80%
Contig1101_ABD	Fickett found Glimmer not found			Both not found		
Contig111	44.36%	55.64%	0.00%	Glimmer found Fickett not found		
Contig113	Both not found			Both not found		
Contig114	Fickett found Glimmer not found			Both not found		
Contig1143_ABD	56.76%	34.02%	9.22%	46.45%	24.73%	28.82%
Contig115	Fickett found Glimmer not found			Both not found		
Contig117	20.73%	54.90%	24.37%	Glimmer found Fickett not found		
Contig120	72.35%	25.88%	1.77%	52.99%	8.01%	39.00%
Contig121	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig122	34.91%	65.09%	0.00%	72.20%	23.24%	4.56%
Contig126	9.28%	67.65%	23.08%	Glimmer found Fickett not found		
Contig127	23.19%	71.25%	5.56%	Both found but not overlap		
Contig128	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig1297_ABD	73.29%	18.74%	7.97%	64.92%	11.69%	23.40%
Contig130	37.74%	41.17%	21.10%	52.34%	5.51%	42.15%
Contig1303_ABD	70.07%	29.93%	0.00%	80.74%	17.15%	2.11%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig132	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig133	Fickett found Glimmer not found			Both not found		
Contig134	47.11%	52.89%	0.00%	Glimmer found Fickett not found		
Contig137	40.00%	57.85%	2.15%	6.60%	36.88%	56.52%
Contig141	90.86%	9.14%	0.00%	81.64%	0.40%	17.96%
Contig144	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig145	61.19%	20.90%	17.91%	Glimmer found Fickett not found		
Contig146	99.34%	0.66%	0.00%	67.97%	1.31%	30.72%
Contig148	Fickett found Glimmer not found			Both not found		
Contig150	45.00%	42.21%	12.79%	59.66%	15.76%	24.58%
Contig151	56.31%	28.41%	15.28%	Both found but not overlap		
Contig152	Both found but not overlap			Both found but not overlap		
Contig1539_ABD	93.41%	6.59%	0.00%	95.50%	3.62%	0.88%
Contig1545_ABD	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig156	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig158	92.73%	2.64%	4.63%	51.20%	0.77%	48.03%
Contig159	Both not found			Both not found		
Contig161	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig162	Fickett found Glimmer not found			Both not found		
Contig163	70.95%	16.39%	12.66%	71.57%	27.30%	1.12%
Contig1638_ABD	89.66%	4.93%	5.42%	86.08%	0.52%	13.40%
Contig166	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig1661_ABD	30.57%	69.43%	0.00%	53.50%	46.50%	0.00%
Contig167	69.11%	30.89%	0.00%	86.39%	13.61%	0.00%
Contig169	0.33%	53.58%	46.09%	22.87%	36.92%	40.21%
Contig1714_ABD	Both found but not overlap			Both found but not overlap		
Contig172	74.49%	25.51%	0.00%	68.85%	20.48%	10.68%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig174	71.08%	5.22%	23.69%	43.62%	0.00%	56.38%
Contig175	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig176	Glimmer found Fickett not found			Glimmer found Fickett not found		
Contig178	59.52%	40.48%	0.00%	68.14%	27.63%	4.23%
Contig178_ABD	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig179	70.69%	29.31%	0.00%	60.57%	16.67%	22.76%
Contig180	49.11%	44.22%	6.67%	Glimmer found Fickett not found		
Contig181	72.24%	11.32%	16.44%	Glimmer found Fickett not found		
Contig183	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig184	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig185	16.90%	83.10%	0.00%	51.64%	48.36%	0.00%
Contig186	26.10%	67.42%	6.47%	11.16%	57.90%	30.94%
Contig187	44.67%	55.33%	0.00%	Glimmer found Fickett not found		
Contig188	89.46%	7.74%	2.80%	68.10%	3.95%	27.96%
Contig190	Both not found			Both not found		
Contig192	Both found but not overlap			Glimmer found Fickett not found		
Contig194	39.43%	12.83%	47.74%	7.48%	23.70%	68.81%
Contig195	34.41%	29.90%	35.69%	Glimmer found Fickett not found		
Contig196	Fickett found Glimmer not found			Both not found		
Contig197	Both found but not overlap			Glimmer found Fickett not found		
Contig198	68.21%	31.79%	0.00%	Glimmer found Fickett not found		
Contig200	75.82%	0.00%	24.18%	62.82%	7.39%	29.79%
Contig201	95.57%	4.43%	0.00%	74.07%	11.60%	14.33%
Contig203	Both found but not overlap			Glimmer found Fickett not found		
Contig204	71.45%	28.55%	0.00%	76.54%	3.62%	19.84%
Contig206	Both not found			Both not found		
Contig207	Fickett found Glimmer not found			Fickett found Glimmer not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig209	84.34%	11.89%	3.77%	27.07%	19.48%	53.45%
Contig212	Both found but not overlap			Glimmer found Fickett not found		
Contig213	Fickett found Glimmer not found			Both not found		
Contig214	92.43%	7.57%	0.00%	49.38%	40.84%	9.78%
Contig215	92.90%	4.14%	2.96%	66.38%	8.01%	25.61%
Contig216	40.99%	49.10%	9.91%	Glimmer found Fickett not found		
Contig217	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig218	67.06%	4.30%	28.64%	19.12%	0.00%	80.88%
Contig219	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig220	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig222	Both found but not overlap			Both found but not overlap		
Contig224	Both found but not overlap			Both found but not overlap		
Contig225	45.70%	32.42%	21.88%	Glimmer found Fickett not found		
Contig227	49.30%	29.02%	21.68%	50.41%	1.79%	47.80%
Contig228	60.46%	16.07%	23.47%	Glimmer found Fickett not found		
Contig229	55.22%	32.32%	12.46%	Glimmer found Fickett not found		
Contig232	71.88%	22.50%	5.63%	92.83%	5.51%	1.65%
Contig233	Both found but not overlap			Glimmer found Fickett not found		
Contig234	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig235	Fickett found Glimmer not found			Both not found		
Contig239	48.55%	51.45%	0.00%	38.30%	45.17%	16.53%
Contig240	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig241	83.41%	5.61%	10.98%	81.59%	4.56%	13.85%
Contig242	87.86%	5.87%	6.27%	47.35%	3.89%	48.76%
Contig243	53.62%	34.44%	11.94%	Glimmer found Fickett not found		
Contig244	4.69%	60.85%	34.46%	Glimmer found Fickett not found		
Contig245	50.22%	48.33%	1.45%	52.10%	26.87%	21.03%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig246	19.68%	80.32%	0.00%	32.97%	67.03%	0.00%
Contig247	76.13%	1.56%	22.30%	63.82%	0.00%	36.18%
Contig248	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig249	39.06%	0.00%	60.94%	Glimmer found Fickett not found		
Contig250	Both found but not overlap			Both found but not overlap		
Contig251	Fickett found Glimmer not found			Both not found		
Contig252	48.98%	36.32%	14.70%	41.59%	0.00%	58.41%
Contig254	86.91%	13.09%	0.00%	53.23%	24.72%	22.05%
Contig255	67.72%	32.28%	0.00%	66.95%	26.37%	6.68%
Contig257	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig258	80.85%	7.14%	12.01%	44.47%	10.48%	45.05%
Contig259	28.35%	71.65%	0.00%	42.26%	57.74%	0.00%
Contig261	71.73%	28.27%	0.00%	45.44%	1.86%	52.70%
Contig263	36.66%	63.34%	0.00%	43.16%	48.82%	8.02%
Contig265	40.66%	59.34%	0.00%	9.91%	58.11%	31.97%
Contig266	30.82%	47.95%	21.23%	Glimmer found Fickett not found		
Contig267	51.08%	44.02%	4.90%	Glimmer found Fickett not found		
Contig268	64.06%	33.96%	1.98%	41.51%	11.54%	46.95%
Contig269	76.93%	8.66%	14.41%	32.32%	1.46%	66.22%
Contig270	42.45%	12.80%	44.75%	Glimmer found Fickett not found		
Contig273	61.29%	5.02%	33.69%	32.04%	6.69%	61.27%
Contig274	94.43%	5.57%	0.00%	72.91%	11.86%	15.24%
Contig276	78.66%	4.92%	16.42%	59.28%	8.23%	32.49%
Contig277	13.72%	59.04%	27.23%	Both found but not overlap		
Contig279	Both found but not overlap			Both found but not overlap		
Contig280	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig281	53.82%	39.24%	6.94%	24.89%	19.95%	55.17%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig282	26.60%	73.40%	0.00%	Both found but not overlap		
Contig284	51.74%	48.26%	0.00%	54.13%	19.12%	26.75%
Contig285	1.45%	83.82%	14.73%	3.55%	60.43%	36.02%
Contig286	80.65%	0.00%	19.35%	57.07%	0.00%	42.93%
Contig287	70.52%	26.18%	3.30%	82.96%	11.38%	5.66%
Contig288	88.40%	11.60%	0.00%	84.84%	0.00%	15.16%
Contig289	45.16%	54.84%	0.00%	14.89%	80.14%	4.96%
Contig291	76.03%	2.93%	21.05%	58.11%	0.00%	41.89%
Contig292	Both found but not overlap			Both found but not overlap		
Contig293	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig294	Fickett found Glimmer not found			Both not found		
Contig295	65.85%	4.88%	29.27%	Both found but not overlap		
Contig296	50.48%	8.19%	41.34%	15.01%	8.19%	76.81%
Contig297	45.66%	27.31%	27.02%	44.46%	7.20%	48.34%
Contig298	Fickett found Glimmer not found			Both not found		
Contig299	Fickett found Glimmer not found			Both not found		
Contig300	86.49%	9.47%	4.05%	79.79%	1.28%	18.93%
Contig301	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig303	27.50%	72.50%	0.00%	Both found but not overlap		
Contig304	78.40%	6.52%	15.08%	52.28%	3.80%	43.92%
Contig305	39.35%	23.72%	36.93%	Glimmer found Fickett not found		
Contig305_ABD	78.94%	14.16%	6.90%	65.42%	10.15%	24.43%
Contig306	7.56%	50.58%	41.86%	Glimmer found Fickett not found		
Contig307	86.89%	3.58%	9.53%	58.09%	1.94%	39.97%
Contig308	79.42%	17.41%	3.17%	72.27%	4.75%	22.98%
Contig309	10.91%	48.08%	41.00%	Both found but not overlap		
Contig310	89.34%	3.61%	7.05%	77.21%	4.86%	17.93%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig311	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig313	57.54%	37.54%	4.92%	60.33%	0.23%	39.44%
Contig314	10.00%	90.00%	0.00%	Both found but not overlap		
Contig315	63.87%	35.69%	0.44%	72.69%	12.51%	14.80%
Contig316	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig317	Fickett found Glimmer not found			Both not found		
Contig318	47.11%	52.89%	0.00%	Glimmer found Fickett not found		
Contig319	90.98%	9.02%	0.00%	60.07%	31.15%	8.78%
Contig320	33.77%	49.97%	16.26%	27.12%	61.23%	11.64%
Contig321	20.76%	72.59%	6.65%	Both found but not overlap		
Contig322	62.25%	32.51%	5.24%	56.54%	6.43%	37.03%
Contig325	Both found but not overlap			Glimmer found Fickett not found		
Contig326	53.93%	41.94%	4.13%	Glimmer found Fickett not found		
Contig327	35.86%	14.48%	49.66%	Glimmer found Fickett not found		
Contig328	49.54%	49.12%	1.34%	60.88%	39.12%	0.00%
Contig329	71.47%	22.20%	6.33%	65.26%	11.97%	22.78%
Contig330	84.92%	9.81%	5.27%	50.13%	5.57%	44.30%
Contig331	91.90%	7.79%	0.31%	Both found but not overlap		
Contig332	76.15%	15.74%	8.11%	47.15%	32.96%	19.89%
Contig333	58.91%	39.79%	1.30%	68.06%	7.24%	24.70%
Contig334	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig335	66.43%	18.65%	14.92%	46.10%	23.81%	30.09%
Contig336	61.81%	27.20%	10.98%	22.71%	27.20%	50.08%
Contig337	56.43%	43.57%	0.00%	44.60%	55.40%	0.00%
Contig338	Both not found			Both not found		
Contig339	28.70%	71.30%	0.00%	Glimmer found Fickett not found		
Contig340	Fickett found Glimmer not found			Fickett found Glimmer not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig341	97.14%	2.86%	0.00%	Glimmer found Fickett not found		
Contig342	48.40%	45.91%	5.69%	62.71%	1.04%	36.25%
Contig343	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig344	29.55%	70.45%	0.00%	37.25%	49.02%	13.73%
Contig345	Fickett found Glimmer not found			Both not found		
Contig346	88.80%	11.13%	0.07%	69.85%	2.56%	27.58%
Contig347	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig348	Both found but not overlap			Glimmer found Fickett not found		
Contig349	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig350	67.98%	21.22%	10.80%	25.29%	34.84%	39.87%
Contig351	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig352	57.50%	42.50%	0.00%	78.01%	14.71%	7.29%
Contig353	43.52%	56.48%	0.00%	5.05%	86.14%	8.81%
Contig354	24.40%	74.51%	1.10%	26.36%	73.64%	0.00%
Contig355	60.75%	0.00%	39.25%	Glimmer found Fickett not found		
Contig356	89.90%	7.79%	2.31%	79.17%	7.69%	13.14%
Contig357	Fickett found Glimmer not found			Both not found		
Contig358	58.61%	28.45%	12.94%	22.98%	29.69%	47.33%
Contig359	56.04%	0.00%	43.96%	15.19%	1.50%	83.31%
Contig360	90.18%	9.82%	0.00%	78.04%	9.98%	11.98%
Contig361	46.91%	28.24%	24.85%	35.95%	0.00%	64.05%
Contig363	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig364	68.39%	26.25%	5.36%	60.87%	22.13%	17.00%
Contig365	0.28%	84.78%	14.93%	6.99%	78.76%	14.25%
Contig367	34.20%	48.45%	17.35%	2.51%	58.99%	38.49%
Contig368	28.00%	71.80%	0.20%	17.04%	68.13%	14.83%
Contig369	6.21%	50.28%	43.50%	10.72%	63.91%	25.37%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig370	Fickett found Glimmer not found			Both not found		
Contig371	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig372	84.49%	15.51%	0.00%	45.96%	3.80%	50.24%
Contig373	34.51%	65.49%	0.00%	77.58%	22.42%	0.00%
Contig374	79.65%	8.85%	11.50%	Glimmer found Fickett not found		
Contig375	90.82%	2.34%	6.83%	83.78%	1.73%	14.49%
Contig376	8.15%	91.85%	0.00%	Both found but not overlap		
Contig377	56.44%	43.56%	0.00%	50.65%	0.00%	49.35%
Contig378	64.50%	19.90%	15.60%	50.47%	3.53%	46.00%
Contig379	80.80%	19.20%	0.00%	61.57%	16.56%	21.87%
Contig380	28.27%	24.08%	47.64%	Both found but not overlap		
Contig381	Fickett found Glimmer not found			Both not found		
Contig382	81.74%	0.00%	18.26%	65.00%	17.86%	17.14%
Contig383	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig384	26.28%	64.35%	9.37%	49.54%	45.37%	5.09%
Contig385	81.02%	6.58%	12.41%	74.18%	2.82%	23.00%
Contig386	Fickett found Glimmer not found			Both not found		
Contig387	96.11%	1.25%	2.64%	52.40%	1.88%	45.72%
Contig388	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig389	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig390	45.53%	48.24%	6.23%	49.41%	42.16%	8.43%
Contig391	76.21%	23.79%	0.00%	Both found but not overlap		
Contig392	63.01%	20.05%	16.94%	62.10%	0.00%	37.90%
Contig393	26.69%	61.86%	11.45%	59.29%	40.71%	0.00%
Contig394	27.16%	72.84%	0.00%	31.55%	64.69%	3.76%
Contig395	78.09%	10.65%	11.26%	45.92%	6.01%	48.07%
Contig396	71.41%	27.23%	1.36%	92.01%	1.43%	6.56%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig398	59.78%	12.16%	28.06%	32.76%	0.00%	67.24%
Contig399	77.23%	22.77%	0.00%	82.21%	4.43%	13.36%
Contig400	54.01%	44.91%	1.08%	25.84%	32.99%	41.17%
Contig401	77.01%	21.80%	1.18%	31.64%	42.82%	25.54%
Contig402	81.86%	17.84%	0.30%	87.71%	7.36%	4.93%
Contig403	86.07%	13.93%	0.00%	73.99%	10.01%	16.00%
Contig404	83.48%	14.10%	2.42%	84.45%	2.09%	13.46%
Contig405	26.53%	73.47%	0.00%	35.63%	55.92%	8.45%
Contig406	67.21%	19.11%	13.67%	59.46%	20.10%	20.44%
Contig407	68.39%	28.58%	3.02%	74.92%	21.01%	4.07%
Contig408	55.52%	31.35%	13.13%	45.16%	31.76%	23.08%
Contig409	83.94%	13.47%	2.59%	76.31%	8.84%	14.85%
Contig410	67.91%	28.68%	3.41%	52.98%	43.58%	3.44%
Contig411	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig412	Both found but not overlap			Both found but not overlap		
Contig413	94.17%	5.83%	0.00%	92.38%	5.28%	2.35%
Contig414	58.30%	40.33%	1.38%	56.39%	41.45%	2.16%
Contig415	72.46%	27.31%	0.23%	65.22%	24.25%	10.53%
Contig416	26.12%	73.88%	0.00%	Both found but not overlap		
Contig417	76.05%	15.41%	8.53%	47.12%	17.82%	35.06%
Contig418	80.24%	9.25%	10.51%	69.15%	16.39%	14.46%
Contig419	95.43%	1.71%	2.86%	67.50%	2.43%	30.07%
Contig420	Both found but not overlap			Glimmer found Fickett not found		
Contig421	69.39%	11.57%	19.04%	55.95%	11.95%	32.10%
Contig422	85.92%	9.56%	4.52%	77.29%	5.21%	17.51%
Contig423	86.85%	3.42%	9.73%	71.55%	1.56%	26.89%
Contig424	80.54%	18.58%	0.88%	74.04%	4.13%	21.84%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig425	90.38%	9.62%	0.00%	43.45%	12.91%	43.64%
Contig426	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig427	56.53%	43.47%	0.00%	55.11%	11.99%	32.90%
Contig428	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig429	58.75%	24.29%	16.96%	52.87%	7.59%	39.54%
Contig430	90.40%	2.90%	6.69%	71.86%	3.92%	24.22%
Contig431	35.26%	64.74%	0.00%	50.93%	49.07%	0.00%
Contig432	74.36%	14.32%	11.33%	66.49%	3.55%	29.97%
Contig433	93.26%	3.80%	2.94%	76.57%	1.17%	22.26%
Contig434	81.22%	14.86%	3.92%	75.80%	10.18%	14.02%
Contig435	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig436	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig437	23.68%	69.75%	6.56%	55.28%	26.02%	18.70%
Contig438	91.11%	7.65%	1.23%	82.51%	2.35%	15.14%
Contig439	63.91%	21.76%	14.33%	30.03%	4.79%	65.18%
Contig440	97.72%	2.28%	0.00%	86.73%	4.34%	8.94%
Contig441	67.66%	11.83%	20.50%	61.76%	2.08%	36.16%
Contig442	69.49%	17.25%	13.26%	73.00%	7.64%	19.36%
Contig443	27.81%	52.41%	19.79%	40.05%	37.62%	22.33%
Contig444	Both not found			Both not found		
Contig446	81.24%	14.53%	4.22%	62.82%	3.88%	33.31%
Contig447	63.66%	32.91%	3.43%	89.01%	0.00%	10.99%
Contig448	19.18%	73.14%	7.68%	85.90%	0.78%	13.32%
Contig449	76.41%	13.10%	10.48%	59.30%	1.78%	38.92%
Contig450	58.98%	38.78%	2.24%	54.42%	30.69%	14.89%
Contig451	52.98%	45.02%	2.01%	34.52%	34.01%	31.47%
Contig452	61.57%	34.36%	4.07%	73.30%	5.85%	20.85%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig453	93.13%	3.14%	3.73%	89.07%	2.03%	8.91%
Contig454	87.92%	10.10%	1.98%	74.61%	5.52%	19.88%
Contig456	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig457	81.02%	15.66%	3.32%	69.57%	8.20%	22.22%
Contig458	50.34%	38.44%	11.22%	28.53%	0.00%	71.47%
Contig459	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig460	83.84%	2.78%	13.38%	49.01%	14.47%	36.52%
Contig461	53.52%	37.97%	8.50%	56.48%	43.52%	0.00%
Contig462	87.68%	11.61%	0.71%	36.92%	20.88%	42.20%
Contig463	78.07%	3.02%	18.91%	55.19%	6.82%	37.99%
Contig464	Both found but not overlap			Both found but not overlap		
Contig465	14.92%	61.20%	23.87%	Both found but not overlap		
Contig466	83.97%	3.41%	12.61%	77.77%	2.54%	19.69%
Contig467	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig468	59.95%	2.28%	37.77%	46.64%	0.00%	53.36%
Contig469	75.90%	18.71%	5.40%	61.46%	13.47%	25.07%
Contig470	51.03%	39.34%	9.63%	70.61%	2.12%	27.27%
Contig471	42.28%	55.89%	1.83%	23.26%	34.39%	42.34%
Contig471_ABD	50.70%	49.30%	0.00%	Glimmer found Fickett not found		
Contig472	Both found but not overlap			Both found but not overlap		
Contig473	Both found but not overlap			Glimmer found Fickett not found		
Contig474	87.60%	9.44%	2.96%	63.74%	12.30%	23.96%
Contig475	92.01%	4.42%	3.57%	81.06%	5.06%	13.88%
Contig476	74.60%	16.26%	9.13%	67.53%	0.00%	32.47%
Contig477	58.55%	39.12%	2.33%	56.21%	22.43%	21.35%
Contig478	65.12%	28.01%	6.87%	55.35%	22.76%	21.89%
Contig479	46.95%	51.82%	1.23%	62.83%	9.97%	27.20%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig480	11.79%	82.26%	5.95%	23.00%	50.33%	26.67%
Contig481	67.88%	19.07%	13.05%	53.54%	20.91%	25.55%
Contig482	88.98%	10.05%	0.97%	70.48%	4.51%	25.01%
Contig483	89.00%	3.50%	7.49%	65.70%	6.78%	27.52%
Contig484	71.37%	25.10%	3.53%	57.88%	17.35%	24.77%
Contig485	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig486	76.92%	20.38%	2.70%	56.84%	11.81%	31.36%
Contig487	73.57%	24.58%	1.85%	55.34%	18.39%	26.27%
Contig488	59.11%	40.64%	0.25%	44.10%	24.84%	31.06%
Contig489	59.70%	2.96%	37.34%	41.26%	0.00%	58.74%
Contig490	80.93%	11.68%	7.39%	70.31%	6.64%	23.05%
Contig491	60.19%	29.23%	10.58%	60.09%	17.55%	22.36%
Contig492	75.03%	11.65%	13.32%	67.94%	10.92%	21.15%
Contig493	82.11%	17.89%	0.00%	62.18%	12.03%	25.79%
Contig494	78.58%	9.86%	11.56%	65.92%	8.42%	25.66%
Contig495	55.29%	36.22%	8.49%	55.92%	24.66%	19.42%
Contig496	84.87%	4.95%	10.18%	54.41%	4.72%	40.87%
Contig497	39.84%	55.92%	4.25%	24.58%	50.33%	25.08%
Contig498	Fickett found Glimmer not found			Both not found		
Contig499	79.86%	20.14%	0.00%	14.28%	66.90%	18.83%
Contig500	46.11%	44.49%	9.40%	67.07%	20.13%	12.80%
Contig501	17.01%	82.99%	0.00%	23.28%	67.74%	8.97%
Contig502	81.16%	11.81%	7.03%	64.56%	13.96%	21.48%
Contig503	Fickett found Glimmer not found			Both not found		
Contig504	77.22%	12.28%	10.49%	81.68%	8.76%	9.56%
Contig505	52.01%	37.85%	10.14%	43.49%	17.54%	38.97%
Contig506	75.29%	10.91%	13.80%	82.37%	0.00%	17.63%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig507	56.73%	26.06%	17.21%	70.79%	0.00%	29.21%
Contig508	78.85%	18.98%	2.17%	62.80%	16.65%	20.55%
Contig509	70.29%	22.47%	7.25%	59.84%	3.81%	36.35%
Contig510	69.41%	24.73%	5.85%	62.65%	3.08%	34.28%
Contig511	77.41%	11.41%	11.18%	66.11%	4.04%	29.85%
Contig512	70.25%	29.13%	0.62%	56.44%	30.77%	12.79%
Contig513	45.21%	34.82%	19.97%	81.85%	3.22%	14.94%
Contig514	92.03%	4.53%	3.44%	77.00%	7.70%	15.30%
Contig515	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig516	71.89%	0.55%	27.56%	67.21%	2.10%	30.69%
Contig517	51.87%	39.70%	8.43%	58.84%	8.17%	32.99%
Contig518	70.38%	26.95%	2.67%	64.86%	17.97%	17.17%
Contig520	69.12%	19.84%	11.04%	46.77%	35.56%	17.66%
Contig521	87.30%	8.87%	3.82%	69.01%	4.26%	26.73%
Contig522	43.23%	12.55%	44.22%	Glimmer found Fickett not found		
Contig523	77.62%	16.99%	5.39%	46.50%	23.99%	29.51%
Contig524	Both found but not overlap			0.59%	85.68%	13.73%
Contig525	81.01%	17.03%	1.96%	63.26%	12.96%	23.78%
Contig526	60.92%	11.06%	28.02%	52.99%	4.29%	42.72%
Contig527	73.12%	24.91%	1.97%	84.17%	0.00%	15.83%
Contig528	37.05%	59.82%	3.13%	74.29%	17.51%	8.20%
Contig529	77.42%	16.16%	6.42%	92.02%	3.34%	4.64%
Contig530	79.39%	14.27%	6.34%	79.49%	3.83%	16.67%
Contig531	58.10%	32.89%	9.01%	56.12%	23.26%	20.62%
Contig532	82.84%	7.28%	9.88%	76.35%	11.22%	12.43%
Contig533	80.32%	16.29%	3.40%	63.49%	6.46%	30.05%
Contig534	54.86%	36.78%	8.36%	25.75%	43.31%	30.94%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig535	55.10%	37.49%	7.41%	56.06%	17.67%	26.27%
Contig536	59.23%	32.34%	8.43%	38.07%	15.88%	46.05%
Contig537	58.22%	35.48%	6.30%	58.59%	7.56%	33.86%
Contig538	60.50%	25.49%	14.01%	63.35%	14.87%	21.78%
Contig539	58.09%	16.82%	25.09%	54.14%	0.38%	45.48%
Contig540	67.35%	28.74%	3.91%	72.92%	9.58%	17.49%
Contig541	61.33%	18.45%	20.21%	71.46%	6.59%	21.95%
Contig542	75.97%	13.44%	10.59%	70.02%	8.99%	20.99%
Contig543	60.03%	10.69%	29.28%	64.96%	4.31%	30.73%
Contig544	41.64%	57.22%	1.14%	37.94%	48.53%	13.53%
Contig545	66.75%	21.39%	11.86%	48.12%	20.86%	31.02%
Contig546	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig547	88.54%	4.06%	7.39%	62.99%	3.03%	33.98%
Contig548	62.27%	26.31%	11.42%	60.46%	0.00%	39.54%
Contig549	87.29%	2.06%	10.65%	61.97%	2.21%	35.82%
Contig550	62.75%	27.48%	9.78%	73.47%	11.86%	14.68%
Average	62.59%	27.99%	9.41%	60.74%	16.06%	23.19%

ตารางแสดงค่า found, under และ over ของผลการทำนายจากโปรแกรม Fickett และ Glimmer โดย
อ่านสายลำดับเบสวิธี Complement

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig106	Both found but not overlap			Glimmer found Fickett not found		
Contig110	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig1101_ABD	64.30%	16.63%	19.07%	Glimmer found Fickett not found		
Contig111	Fickett found Glimmer not found			Both not found		
Contig113	Glimmer found Fickett not found			Glimmer found Fickett not found		
Contig114	32.37%	0.00%	67.63%	Glimmer found Fickett not found		
Contig1143_ABD	34.68%	54.09%	11.23%	29.23%	46.00%	24.77%
Contig115	49.54%	0.00%	50.46%	Glimmer found Fickett not found		
Contig117	Fickett found Glimmer not found			Both not found		
Contig120	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig121	89.71%	10.29%	0.00%	71.82%	28.18%	0.00%
Contig122	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig126	Fickett found Glimmer not found			Both not found		
Contig127	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig128	21.12%	78.88%	0.00%	25.69%	56.88%	17.43%
Contig1297_ABD	56.17%	30.03%	13.81%	54.42%	11.03%	34.55%
Contig130	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig1303_ABD	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig132	79.43%	4.54%	16.02%	76.50%	0.00%	23.50%
Contig133	62.67%	37.33%	0.00%	Glimmer found Fickett not found		
Contig134	19.71%	78.83%	1.46%	Glimmer found Fickett not found		
Contig137	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig141	36.76%	63.24%	0.00%	42.79%	57.21%	0.00%
Contig144	24.38%	71.39%	4.23%	Both found but not overlap		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig145	Fickett found Glimmer not found			Both not found		
Contig146	29.43%	69.98%	0.59%	1.09%	63.08%	35.84%
Contig148	25.76%	55.59%	18.64%	Glimmer found Fickett not found		
Contig150	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig151	67.51%	4.59%	27.90%	48.15%	29.23%	22.62%
Contig152	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig1539_ABD	53.98%	39.83%	6.19%	46.91%	37.62%	15.47%
Contig1545_ABD	37.88%	62.12%	0.00%	67.08%	32.92%	0.00%
Contig156	86.94%	2.46%	10.61%	53.27%	0.00%	46.73%
Contig158	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig159	Glimmer found Fickett not found			Glimmer found Fickett not found		
Contig161	29.18%	68.10%	2.72%	30.43%	60.17%	9.40%
Contig162	Both found but not overlap			Glimmer found Fickett not found		
Contig163	21.73%	78.27%	0.00%	29.33%	70.67%	0.00%
Contig1638_ABD	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig166	81.62%	5.15%	13.24%	15.33%	0.74%	83.94%
Contig1661_ABD	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig167	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig169	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig1714_ABD	63.77%	36.23%	0.00%	24.13%	18.84%	57.02%
Contig172	67.88%	17.98%	14.14%	49.26%	0.00%	50.74%
Contig174	85.66%	0.00%	14.34%	16.08%	14.69%	69.23%
Contig175	21.43%	61.90%	16.67%	Both found but not overlap		
Contig176	Fickett found Glimmer not found			Both not found		
Contig178	7.39%	92.61%	0.00%	8.53%	91.47%	0.00%
Contig178_ABD	45.05%	54.95%	0.00%	44.01%	49.60%	6.38%
Contig179	Fickett found Glimmer not found			Fickett found Glimmer not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig180	Fickett found Glimmer not found			Both not found		
Contig181	Fickett found Glimmer not found			Both not found		
Contig183	36.36%	37.21%	26.43%	68.42%	31.58%	0.00%
Contig184	81.34%	11.34%	7.32%	27.51%	0.00%	72.49%
Contig185	76.85%	18.99%	4.17%	45.65%	16.04%	38.31%
Contig186	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig187	Fickett found Glimmer not found			Both not found		
Contig188	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig190	Glimmer found Fickett not found			Glimmer found Fickett not found		
Contig192	Fickett found Glimmer not found			Both not found		
Contig194	41.48%	57.17%	1.35%	3.15%	59.87%	36.97%
Contig195	19.96%	51.84%	28.20%	Both found but not overlap		
Contig196	7.85%	70.62%	21.53%	Glimmer found Fickett not found		
Contig197	Fickett found Glimmer not found			Both not found		
Contig198	Fickett found Glimmer not found			Both not found		
Contig200	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig201	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig203	Both found but not overlap			Glimmer found Fickett not found		
Contig204	36.28%	63.72%	0.00%	38.43%	43.06%	18.51%
Contig206	Glimmer found Fickett not found			Glimmer found Fickett not found		
Contig207	37.81%	23.50%	38.69%	45.80%	0.00%	54.20%
Contig209	59.80%	40.20%	0.00%	30.98%	30.52%	38.50%
Contig212	Fickett found Glimmer not found			Both not found		
Contig213	54.44%	0.72%	44.84%	Glimmer found Fickett not found		
Contig214	25.55%	68.39%	6.06%	53.09%	46.91%	0.00%
Contig215	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig216	Fickett found Glimmer not found			Both not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig217	69.67%	17.68%	12.65%	24.62%	0.00%	75.38%
Contig218	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig219	96.07%	3.93%	0.00%	81.81%	0.68%	17.51%
Contig220	77.72%	22.28%	0.00%	62.03%	16.04%	21.93%
Contig222	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig224	52.49%	39.39%	8.11%	Both found but not overlap		
Contig225	Fickett found Glimmer not found			Both not found		
Contig227	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig228	Fickett found Glimmer not found			Both not found		
Contig229	Fickett found Glimmer not found			Both not found		
Contig232	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig233	Fickett found Glimmer not found			Both not found		
Contig234	65.84%	30.53%	3.63%	80.00%	20.00%	0.00%
Contig235	89.61%	0.00%	10.39%	Glimmer found Fickett not found		
Contig239	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig240	54.13%	22.02%	23.85%	36.70%	22.02%	41.28%
Contig241	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig242	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig243	Fickett found Glimmer not found			Both not found		
Contig244	Fickett found Glimmer not found			Both not found		
Contig245	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig246	57.71%	37.05%	5.24%	53.22%	13.14%	33.64%
Contig247	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig248	6.54%	87.17%	6.28%	Both found but not overlap		
Contig249	Fickett found Glimmer not found			Both not found		
Contig250	79.26%	15.45%	5.29%	53.34%	15.45%	31.21%
Contig251	Both found but not overlap			Glimmer found Fickett not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig252	49.48%	33.97%	16.54%	50.46%	0.95%	48.59%
Contig254	63.78%	7.33%	28.89%	38.64%	10.01%	51.35%
Contig255	11.50%	88.50%	0.00%	13.27%	86.73%	0.00%
Contig257	5.71%	94.29%	0.00%	6.71%	93.29%	0.00%
Contig258	88.25%	8.83%	2.92%	62.94%	12.07%	24.99%
Contig259	0.92%	49.77%	49.31%	Both found but not overlap		
Contig261	17.24%	82.76%	0.00%	17.38%	82.62%	0.00%
Contig263	69.59%	30.41%	0.00%	81.34%	6.77%	11.90%
Contig265	55.62%	44.38%	0.00%	83.05%	16.09%	0.86%
Contig266	33.57%	66.43%	0.00%	Glimmer found Fickett not found		
Contig267	Fickett found Glimmer not found			Both not found		
Contig268	71.97%	28.03%	0.00%	57.95%	0.63%	41.42%
Contig269	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig270	Both found but not overlap			Glimmer found Fickett not found		
Contig273	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig274	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig276	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig277	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig279	58.60%	6.60%	34.80%	12.37%	0.00%	87.63%
Contig280	62.27%	5.68%	32.05%	18.17%	7.37%	74.46%
Contig281	29.87%	70.13%	0.00%	18.77%	59.73%	21.50%
Contig282	Fickett found Glimmer found			Fickett found Glimmer not found		
Contig284	34.45%	39.65%	25.89%	Both found but not overlap		
Contig285	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig286	41.63%	43.56%	14.81%	40.64%	22.81%	36.55%
Contig287	53.03%	46.97%	0.00%	53.21%	14.88%	31.91%
Contig288	Fickett found Glimmer not found			Fickett found Glimmer not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig289	63.83%	0.75%	35.41%	60.88%	24.35%	14.76%
Contig291	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig292	51.85%	26.43%	21.72%	22.05%	0.00%	77.95%
Contig293	65.23%	26.43%	8.34%	Glimmer found Fickett not found		
Contig294	Both found but not overlap			Glimmer found Fickett not found		
Contig295	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig296	23.29%	50.00%	26.71%	4.14%	34.87%	60.99%
Contig297	25.30%	67.13%	7.57%	12.73%	77.17%	10.10%
Contig298	32.45%	43.05%	24.50%	Glimmer found Fickett not found		
Contig299	34.25%	51.73%	14.02%	Glimmer found Fickett not found		
Contig300	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig301	57.54%	9.41%	33.05%	41.47%	11.51%	47.02%
Contig303	20.41%	76.29%	3.30%	4.98%	61.46%	33.55%
Contig304	62.05%	11.03%	26.92%	43.23%	0.00%	56.77%
Contig305	19.65%	39.96%	40.40%	Both found but not overlap		
Contig305_ABD	35.38%	57.02%	7.59%	41.21%	41.17%	17.62%
Contig306	Fickett found Glimmer not found			Both not found		
Contig307	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig308	23.33%	76.67%	0.00%	32.22%	67.78%	0.00%
Contig309	37.81%	11.45%	50.74%	31.97%	5.02%	63.01%
Contig310	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig311	56.37%	18.95%	24.69%	19.90%	18.95%	61.15%
Contig313	41.10%	30.21%	28.69%	32.83%	5.02%	62.16%
Contig314	8.43%	91.57%	0.00%	14.46%	85.54%	0.00%
Contig315	58.77%	40.06%	1.17%	53.10%	35.82%	11.08%
Contig316	73.99%	0.00%	26.01%	41.37%	0.00%	58.63%
Contig317	64.63%	27.07%	8.30%	Glimmer found Fickett not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig318	Fickett found Glimmer not found			Both not found		
Contig319	75.29%	4.23%	20.48%	62.97%	4.45%	32.58%
Contig320	41.88%	58.12%	0.00%	57.41%	34.92%	7.67%
Contig321	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig322	60.43%	12.68%	26.89%	55.97%	2.63%	41.40%
Contig325	Fickett found Glimmer not found			Both not found		
Contig326	Both found but not overlap			Glimmer found Fickett not found		
Contig327	24.68%	30.43%	44.89%	Glimmer found Fickett not found		
Contig328	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig329	30.61%	56.83%	12.56%	41.11%	44.11%	14.79%
Contig330	61.06%	27.96%	10.98%	32.42%	17.23%	50.35%
Contig331	31.11%	59.81%	9.08%	62.77%	5.35%	31.87%
Contig332	34.71%	37.32%	27.97%	Both found but not overlap		
Contig333	80.39%	15.94%	3.66%	86.19%	8.80%	5.01%
Contig334	68.29%	18.65%	13.05%	45.80%	3.27%	50.93%
Contig335	38.45%	58.80%	2.75%	37.14%	62.86%	0.00%
Contig336	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig337	52.03%	41.34%	6.63%	52.60%	33.05%	14.35%
Contig338	Glimmer found Fickett not found			Glimmer found Fickett not found		
Contig339	Fickett found Glimmer not found			Both not found		
Contig340	98.56%	1.44%	0.00%	79.23%	1.07%	19.70%
Contig341	39.83%	53.55%	6.61%	17.42%	42.64%	39.94%
Contig342	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig343	88.57%	3.55%	7.88%	27.09%	2.57%	70.33%
Contig344	47.31%	37.71%	14.98%	52.84%	14.51%	32.65%
Contig345	40.02%	17.71%	42.28%	Glimmer found Fickett not found		
Contig346	Fickett found Glimmer not found			Fickett found Glimmer not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig347	46.56%	35.16%	18.28%	23.46%	0.00%	76.54%
Contig348	Fickett found Glimmer not found			Both not found		
Contig349	38.97%	59.10%	1.94%	39.86%	26.96%	33.18%
Contig350	7.08%	74.69%	18.24%	10.12%	53.47%	36.42%
Contig351	30.56%	69.44%	0.00%	76.75%	12.42%	10.83%
Contig352	63.13%	33.66%	3.21%	67.41%	17.25%	15.34%
Contig353	61.47%	23.10%	15.42%	35.21%	22.15%	42.64%
Contig354	47.62%	39.22%	13.17%	45.39%	46.21%	8.40%
Contig355	49.04%	0.96%	50.00%	Glimmer found Fickett not found		
Contig356	57.73%	0.00%	42.27%	Both found but not overlap		
Contig357	Both found but not overlap			Glimmer found Fickett not found		
Contig358	36.24%	63.76%	0.00%	14.64%	57.03%	28.33%
Contig359	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig360	37.40%	56.67%	5.94%	33.85%	54.38%	11.78%
Contig361	64.22%	17.11%	18.67%	Both found but not overlap		
Contig363	37.80%	37.97%	24.24%	46.13%	53.87%	0.00%
Contig364	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig365	71.94%	14.47%	13.59%	47.21%	15.29%	37.50%
Contig367	41.44%	55.44%	3.13%	37.79%	60.79%	1.42%
Contig368	73.74%	18.37%	7.89%	75.22%	7.30%	17.48%
Contig369	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig370	29.13%	0.00%	70.87%	Glimmer found Fickett not found		
Contig371	Both found but not overlap			Both found but not overlap		
Contig372	31.30%	54.20%	14.49%	17.14%	17.92%	64.94%
Contig373	62.46%	36.25%	1.28%	52.99%	42.31%	4.71%
Contig374	Fickett found Glimmer not found			Both not found		
Contig375	Fickett found Glimmer not found			Fickett found Glimmer not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig376	56.07%	14.56%	29.37%	33.22%	10.05%	56.74%
Contig377	92.29%	7.35%	0.35%	25.93%	28.75%	45.33%
Contig378	40.77%	12.96%	46.27%	27.86%	10.98%	61.16%
Contig379	30.68%	64.29%	5.03%	4.36%	60.07%	35.57%
Contig380	43.07%	52.76%	4.17%	66.24%	33.76%	0.00%
Contig381	56.50%	23.92%	19.58%	Both found but not overlap		
Contig382	69.12%	22.79%	8.09%	62.30%	6.60%	31.10%
Contig383	60.87%	3.67%	35.45%	25.50%	2.22%	72.28%
Contig384	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig385	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig386	37.00%	37.71%	25.29%	Glimmer found Fickett not found		
Contig387	46.94%	37.36%	15.70%	30.67%	24.92%	44.41%
Contig388	65.05%	14.68%	20.27%	43.44%	0.10%	56.47%
Contig389	70.56%	2.28%	27.16%	70.84%	0.00%	29.16%
Contig390	42.09%	34.65%	23.26%	16.35%	38.14%	45.51%
Contig391	42.39%	21.59%	36.03%	62.41%	22.70%	14.89%
Contig392	25.93%	25.93%	48.14%	Both found but not overlap		
Contig393	11.77%	88.23%	0.00%	13.83%	86.17%	0.00%
Contig394	44.78%	26.12%	29.09%	30.72%	59.53%	9.74%
Contig395	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig396	35.82%	60.51%	3.67%	19.22%	66.38%	14.40%
Contig398	58.13%	13.53%	28.34%	23.25%	6.35%	70.40%
Contig399	42.70%	57.30%	0.00%	32.78%	40.31%	26.91%
Contig400	44.41%	32.81%	22.78%	38.61%	23.96%	37.43%
Contig401	63.25%	18.64%	18.11%	34.46%	3.86%	61.68%
Contig402	46.32%	41.61%	12.06%	37.40%	0.00%	62.60%
Contig403	55.71%	36.46%	7.83%	37.97%	18.11%	43.93%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig404	59.76%	39.35%	0.89%	49.10%	38.84%	12.06%
Contig405	56.72%	28.32%	14.96%	2.90%	26.08%	71.03%
Contig406	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig407	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig408	19.77%	33.99%	46.24%	Both found but not overlap		
Contig409	43.08%	56.92%	0.00%	35.65%	56.84%	7.51%
Contig410	64.47%	19.22%	16.31%	28.83%	34.46%	36.71%
Contig411	58.97%	38.11%	2.92%	35.41%	64.59%	0.00%
Contig412	25.34%	31.80%	42.86%	27.10%	25.96%	46.94%
Contig413	Both found but not overlap			2.54%	96.89%	0.57%
Contig414	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig415	49.89%	42.69%	7.42%	66.28%	0.18%	33.54%
Contig416	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig417	84.62%	9.76%	5.61%	78.45%	0.00%	21.55%
Contig418	49.22%	44.85%	5.93%	66.75%	15.01%	18.24%
Contig419	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig420	Fickett found Glimmer not found			Both not found		
Contig421	81.49%	14.34%	4.17%	40.83%	19.58%	39.58%
Contig422	59.15%	29.33%	11.52%	67.96%	5.07%	26.97%
Contig423	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig424	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig425	76.24%	13.72%	10.04%	44.32%	1.49%	54.19%
Contig426	17.49%	19.06%	63.45%	Both found but not overlap		
Contig427	69.86%	29.32%	0.81%	57.31%	32.61%	10.08%
Contig428	57.69%	16.26%	26.05%	52.81%	9.35%	37.84%
Contig429	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig430	73.80%	6.76%	19.44%	30.16%	11.70%	58.14%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig431	51.81%	21.39%	26.80%	33.67%	18.77%	47.56%
Contig432	63.62%	18.64%	17.73%	46.63%	22.56%	30.81%
Contig433	23.88%	74.08%	2.04%	Both found but not overlap		
Contig434	29.90%	68.61%	1.49%	45.40%	43.84%	10.77%
Contig435	57.28%	0.00%	42.72%	23.64%	0.00%	76.36%
Contig436	69.60%	11.56%	18.84%	49.24%	1.07%	49.69%
Contig437	Fickett found Glimmer not found			Both not found		
Contig438	41.32%	51.26%	7.42%	48.11%	35.15%	16.74%
Contig439	51.24%	22.05%	26.71%	30.87%	6.38%	62.75%
Contig440	50.00%	43.46%	6.54%	61.11%	25.31%	13.58%
Contig441	57.17%	6.95%	35.88%	13.34%	42.55%	44.11%
Contig442	60.45%	26.25%	13.30%	53.71%	8.29%	37.99%
Contig443	27.21%	59.73%	13.06%	32.00%	0.00%	68.00%
Contig444	Glimmer found Fickett not found			Glimmer found Fickett not found		
Contig446	55.47%	37.78%	6.74%	43.53%	32.10%	24.37%
Contig447	84.78%	14.23%	1.00%	33.50%	44.73%	21.77%
Contig448	61.14%	24.20%	14.66%	65.03%	17.38%	17.59%
Contig449	43.75%	50.66%	5.59%	34.48%	30.69%	34.83%
Contig450	29.94%	65.19%	4.87%	31.58%	59.59%	8.82%
Contig451	50.51%	31.31%	18.18%	20.21%	18.57%	61.23%
Contig452	46.09%	47.63%	6.27%	37.04%	43.20%	19.76%
Contig453	69.23%	27.48%	3.29%	64.74%	23.05%	12.21%
Contig454	44.53%	35.75%	19.72%	37.88%	8.11%	54.01%
Contig456	9.40%	88.74%	1.87%	Both found but not overlap		
Contig457	Both found but not overlap			Both found but not overlap		
Contig458	59.73%	4.00%	36.27%	33.51%	0.94%	65.54%
Contig459	41.23%	43.83%	14.94%	4.79%	59.11%	36.10%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig460	47.01%	49.45%	3.53%	32.53%	58.77%	8.71%
Contig461	21.74%	46.42%	31.84%	Both found but not overlap		
Contig462	61.27%	11.39%	27.34%	42.43%	2.32%	55.24%
Contig463	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig464	49.70%	17.11%	33.19%	24.56%	8.09%	67.35%
Contig465	50.10%	44.73%	5.17%	54.67%	3.00%	42.33%
Contig466	60.21%	24.32%	15.48%	45.22%	21.08%	33.70%
Contig467	68.12%	21.90%	9.98%	67.95%	11.09%	20.96%
Contig468	45.98%	5.92%	48.10%	40.78%	0.00%	59.28%
Contig469	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig470	41.98%	28.65%	29.37%	36.81%	18.21%	44.97%
Contig471	25.47%	58.52%	16.01%	56.40%	22.30%	21.30%
Contig471_ABD	Fickett found Glimmer not found			Both not found		
Contig472	87.38%	3.68%	8.93%	59.53%	2.27%	38.20%
Contig473	Both found but not overlap			Glimmer found Fickett not found		
Contig474	55.18%	28.72%	16.11%	51.86%	17.39%	30.75%
Contig475	40.86%	54.00%	5.13%	52.49%	25.54%	21.97%
Contig476	36.95%	44.81%	18.24%	25.80%	55.28%	18.93%
Contig477	16.17%	81.87%	1.96%	23.11%	72.39%	4.50%
Contig478	55.06%	39.06%	5.87%	33.70%	33.42%	32.88%
Contig479	39.36%	40.52%	20.12%	20.24%	40.07%	39.69%
Contig480	31.73%	33.35%	34.92%	42.76%	31.52%	25.71%
Contig481	51.01%	35.83%	13.16%	46.35%	3.25%	50.40%
Contig482	48.98%	51.02%	0.00%	57.44%	42.56%	0.00%
Contig483	40.34%	57.93%	1.72%	36.20%	56.27%	7.53%
Contig484	50.96%	35.82%	13.22%	51.67%	19.76%	28.57%
Contig485	65.16%	6.28%	28.56%	47.61%	1.38%	51.01%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig486	64.09%	18.30%	17.61%	36.62%	8.65%	54.73%
Contig487	48.74%	22.77%	28.49%	32.12%	14.12%	53.76%
Contig488	57.07%	42.93%	0.00%	58.24%	36.52%	5.24%
Contig489	45.39%	47.77%	6.84%	Both found but not overlap		
Contig490	21.28%	57.91%	20.81%	30.65%	61.87%	7.47%
Contig491	41.24%	47.52%	11.24%	46.18%	32.21%	21.61%
Contig492	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig493	37.10%	55.10%	7.80%	47.54%	15.87%	36.58%
Contig494	25.99%	48.21%	25.79%	40.89%	39.99%	19.12%
Contig495	58.51%	32.52%	8.97%	52.88%	5.32%	41.80%
Contig496	36.63%	55.82%	7.55%	19.00%	51.24%	29.76%
Contig497	42.62%	41.68%	15.70%	22.39%	38.35%	39.25%
Contig498	36.33%	31.78%	31.89%	Glimmer found Fickett not found		
Contig499	76.02%	4.93%	19.05%	44.91%	1.88%	53.21%
Contig500	42.99%	36.16%	20.85%	18.95%	20.23%	60.81%
Contig501	62.62%	20.49%	16.88%	73.58%	4.87%	21.55%
Contig502	52.65%	30.38%	16.97%	20.26%	46.26%	33.48%
Contig503	73.22%	16.72%	10.07%	Glimmer found Fickett not found		
Contig504	31.96%	68.04%	0.00%	36.37%	57.49%	6.14%
Contig505	56.26%	20.00%	23.75%	32.61%	15.42%	51.97%
Contig506	57.74%	31.24%	11.02%	36.25%	45.89%	17.85%
Contig507	40.71%	45.92%	13.37%	17.80%	46.42%	35.78%
Contig508	51.95%	28.15%	19.91%	40.90%	22.46%	36.64%
Contig509	49.91%	33.57%	16.51%	46.26%	22.47%	31.26%
Contig510	60.52%	32.07%	7.41%	35.91%	26.70%	37.39%
Contig511	41.58%	45.67%	12.75%	29.93%	45.16%	24.91%
Contig512	73.79%	20.80%	5.42%	57.49%	29.45%	13.07%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig513	11.76%	77.21%	11.03%	17.00%	83.00%	0.00%
Contig514	63.45%	21.30%	15.24%	45.46%	9.00%	45.54%
Contig515	50.39%	32.09%	17.52%	44.90%	22.08%	33.02%
Contig516	44.11%	36.87%	19.02%	30.69%	31.73%	37.58%
Contig517	67.25%	23.13%	9.62%	54.19%	14.70%	31.12%
Contig518	67.19%	25.42%	7.40%	48.33%	21.71%	29.97%
Contig520	62.37%	4.99%	32.64%	67.65%	4.38%	27.97%
Contig521	43.79%	51.62%	4.59%	35.63%	40.09%	24.27%
Contig522	21.53%	78.47%	0.00%	Glimmer found Fickett not found		
Contig523	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig524	48.30%	34.44%	17.25%	39.38%	30.90%	29.72%
Contig525	45.61%	51.06%	3.33%	45.79%	39.27%	14.93%
Contig526	12.73%	87.27%	0.00%	14.62%	85.38%	0.00%
Contig527	52.91%	24.80%	22.29%	52.24%	11.18%	36.58%
Contig528	39.97%	48.96%	11.07%	58.60%	16.43%	24.97%
Contig529	29.22%	61.24%	9.55%	36.24%	49.29%	14.48%
Contig530	38.23%	47.86%	13.92%	52.57%	31.32%	16.11%
Contig531	49.67%	44.99%	5.33%	61.68%	15.37%	22.96%
Contig532	49.14%	26.21%	24.65%	41.84%	25.28%	32.88%
Contig533	54.44%	39.79%	5.76%	46.86%	26.93%	26.21%
Contig534	72.70%	9.30%	18.00%	37.17%	1.46%	61.37%
Contig535	51.79%	19.09%	29.12%	45.30%	12.79%	41.92%
Contig536	48.90%	23.89%	27.21%	27.60%	22.21%	50.20%
Contig537	58.98%	29.68%	11.34%	39.53%	28.09%	32.39%
Contig538	63.71%	16.28%	20.01%	46.17%	1.99%	51.84%
Contig539	50.79%	26.19%	23.01%	34.45%	2.39%	63.16%
Contig540	82.50%	4.96%	12.55%	70.55%	2.86%	26.59%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig541	61.62%	14.47%	23.92%	43.78%	16.19%	40.03%
Contig542	78.02%	15.55%	6.44%	59.87%	12.16%	27.98%
Contig543	27.33%	39.33%	33.33%	Both found but not overlap		
Contig544	47.40%	42.58%	10.01%	33.24%	32.74%	34.02%
Contig545	55.37%	30.16%	14.48%	33.66%	28.59%	37.75%
Contig546	41.59%	58.41%	0.00%	47.74%	38.28%	13.98%
Contig547	37.35%	51.54%	11.12%	29.69%	43.37%	26.94%
Contig548	71.31%	6.50%	22.18%	46.70%	7.87%	45.43%
Contig549	62.45%	8.14%	29.40%	39.93%	9.03%	51.04%
Contig550	58.28%	36.38%	5.34%	43.07%	16.84%	40.09%
Average	49.23%	35.59%	15.18%	47.51%	23.93%	28.56%

ตารางแสดงค่า found, under และ over ของผลการทำนายจากโปรแกรม Fickett และ Glimmer โดยอ่านสายลำดับเบสวิธี Translate Complement

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig106	Both found but not overlap			Glimmer found Fickett not found		
Contig110	Fickett found Glimmer not found			Both not found		
Contig1101_ABD	53.19%	35.23%	11.57%	Both found but not overlap		
Contig111	Fickett found Glimmer not found			Both not found		
Contig113	Glimmer found Fickett not found			Glimmer found Fickett not found		
Contig114	35.71%	0.00%	64.29%	Both found but not overlap		
Contig1143_ABD	34.32%	38.09%	27.59%	29.13%	38.00%	32.88%
Contig115	59.97%	0.00%	40.03%	Glimmer found Fickett not found		
Contig117	Fickett found Glimmer not found			Both not found		
Contig120	Fickett found Glimmer not found			Fickett found Glimmer not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig121	91.01%	8.99%	0.00%	65.83%	34.17%	0.00%
Contig122	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig126	Fickett found Glimmer not found			Both not found		
Contig127	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig128	30.32%	69.68%	0.00%	32.57%	56.88%	10.55%
Contig1297_ABD	66.81%	20.97%	12.23%	48.29%	11.80%	39.92%
Contig130	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig1303_ABD	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig132	94.41%	5.59%	0.00%	87.58%	0.00%	12.42%
Contig133	43.72%	56.28%	0.00%	Glimmer found Fickett not found		
Contig134	15.06%	77.61%	7.34%	Glimmer found Fickett not found		
Contig137	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig141	46.61%	53.39%	0.00%	49.36%	43.99%	6.65%
Contig144	Both found but not overlap			Glimmer found Fickett not found		
Contig145	Fickett found Glimmer not found			Both not found		
Contig146	41.78%	58.22%	0.00%	2.33%	62.62%	35.05%
Contig148	26.67%	54.04%	19.30%	Glimmer found Fickett not found		
Contig150	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig151	59.32%	3.35%	37.33%	56.49%	23.64%	19.88%
Contig152	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig1539_ABD	77.77%	17.13%	5.11%	54.45%	18.21%	27.34%
Contig1545_ABD	35.53%	62.12%	2.35%	65.71%	34.29%	0.00%
Contig156	81.84%	11.18%	6.98%	83.80%	3.05%	13.15%
Contig158	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig159	Both found but not overlap			Glimmer found Fickett not found		
Contig161	35.26%	63.64%	1.10%	30.43%	60.17%	9.40%
Contig162	Glimmer found Fickett not found			Glimmer found Fickett not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig163	4.37%	89.89%	5.75%	4.62%	67.47%	27.91%
Contig1638_ABD	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig166	80.98%	6.86%	12.16%	51.22%	4.04%	44.74%
Contig1661_ABD	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig167	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig169	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig1714_ABD	73.72%	18.84%	7.44%	31.53%	28.32%	40.15%
Contig172	77.33%	22.67%	0.00%	45.72%	30.48%	23.80%
Contig174	57.71%	0.00%	42.29%	Both found but not overlap		
Contig175	3.06%	62.59%	34.35%	Both found but not overlap		
Contig176	Fickett found Glimmer not found			Both not found		
Contig178	14.52%	85.48%	0.00%	11.09%	88.91%	0.00%
Contig178_ABD	46.31%	53.69%	0.00%	42.19%	49.60%	8.21%
Contig179	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig180	Both not found			Both not found		
Contig181	Fickett found Glimmer not found			Both not found		
Contig183	35.79%	37.21%	27.00%	64.89%	30.85%	4.26%
Contig184	80.12%	11.34%	8.54%	49.52%	0.00%	50.48%
Contig185	78.88%	19.94%	1.18%	64.77%	16.04%	19.19%
Contig186	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig187	Fickett found Glimmer not found			Both not found		
Contig188	Fickett found Glimmer not found			Both not found		
Contig190	Both found but not overlap			Glimmer found Fickett not found		
Contig192	Fickett found Glimmer not found			Both not found		
Contig194	26.69%	46.35%	26.97%	Glimmer found Fickett not found		
Contig195	34.38%	65.63%	0.00%	87.27%	0.00%	12.73%
Contig196	4.81%	66.32%	28.87%	Glimmer found Fickett not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig197	Fickett found Glimmer not found			Both not found		
Contig198	Fickett found Glimmer not found			Both not found		
Contig200	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig201	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig203	Glimmer found Fickett not found			Glimmer found Fickett not found		
Contig204	71.28%	27.44%	1.28%	52.10%	20.73%	27.17%
Contig206	Glimmer found Fickett not found			Glimmer found Fickett not found		
Contig207	36.49%	20.00%	43.51%	66.79%	0.00%	33.21%
Contig209	52.59%	47.41%	0.00%	28.06%	32.07%	39.87%
Contig212	Fickett found Glimmer not found			Both not found		
Contig213	70.66%	5.39%	23.94%	Glimmer found Fickett not found		
Contig214	26.64%	68.02%	5.34%	60.67%	39.33%	0.00%
Contig215	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig216	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig217	69.94%	24.97%	5.10%	68.76%	0.00%	31.24%
Contig218	Fickett found Glimmer not found			Both not found		
Contig219	96.56%	2.33%	1.11%	82.11%	2.33%	15.56%
Contig220	88.20%	11.80%	0.00%	60.96%	16.04%	22.99%
Contig222	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig224	38.81%	39.39%	21.80%	Both found but not overlap		
Contig225	Both not found			Both not found		
Contig227	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig228	Fickett found Glimmer not found			Both not found		
Contig229	Fickett found Glimmer not found			Both not found		
Contig232	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig233	Fickett found Glimmer not found			Both not found		
Contig234	60.25%	39.75%	0.00%	56.55%	30.75%	12.71%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig235	88.46%	0.61%	10.93%	Both found but not overlap		
Contig239	Fickett found Glimmer not found			Both not found		
Contig240	54.13%	22.02%	23.85%	39.45%	22.02%	38.53%
Contig241	Fickett found Glimmer not found			Both not found		
Contig242	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig243	Both not found			Both not found		
Contig244	Fickett found Glimmer not found			Both not found		
Contig245	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig246	58.23%	34.88%	6.90%	34.89%	36.81%	28.30%
Contig247	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig248	13.27%	84.88%	1.85%	Both found but not overlap		
Contig249	Fickett found Glimmer not found			Both not found		
Contig250	81.40%	15.74%	2.86%	59.97%	16.32%	23.71%
Contig251	20.43%	61.89%	17.68%	Glimmer found Fickett not found		
Contig252	53.62%	38.90%	7.48%	49.94%	18.17%	31.89%
Contig254	63.46%	18.39%	18.15%	43.02%	13.71%	43.28%
Contig255	11.59%	88.41%	0.00%	13.27%	86.73%	0.00%
Contig257	5.78%	94.22%	0.00%	6.71%	93.29%	0.00%
Contig258	54.52%	0.00%	45.48%	Both found but not overlap		
Contig259	Both found but not overlap			Glimmer found Fickett not found		
Contig261	23.82%	76.18%	0.00%	47.11%	52.89%	0.00%
Contig263	62.59%	37.41%	0.00%	64.05%	27.69%	8.26%
Contig265	54.58%	45.42%	0.00%	75.84%	24.16%	0.00%
Contig266	30.32%	69.68%	0.00%	Glimmer found Fickett not found		
Contig267	Fickett found Glimmer not found			Both not found		
Contig268	81.90%	18.10%	0.00%	Glimmer found Fickett not found		
Contig269	Fickett found Glimmer not found			Fickett found Glimmer not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig270	Both found but not overlap			Glimmer found Fickett not found		
Contig273	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig274	Fickett found Glimmer not found			Both not found		
Contig276	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig277	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig279	69.93%	7.37%	22.70%	43.41%	6.51%	50.08%
Contig280	65.86%	11.29%	22.86%	27.58%	6.29%	66.14%
Contig281	26.52%	73.48%	0.00%	13.72%	64.02%	22.26%
Contig282	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig284	17.53%	52.63%	29.84%	Both found but not overlap		
Contig285	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig286	62.38%	20.78%	16.84%	29.82%	23.19%	46.99%
Contig287	62.70%	25.66%	11.64%	32.34%	20.96%	46.70%
Contig288	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig289	88.59%	0.75%	10.66%	51.61%	19.76%	28.63%
Contig291	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig292	65.31%	24.27%	10.42%	39.73%	14.25%	46.03%
Contig293	70.62%	23.46%	5.92%	Glimmer found Fickett not found		
Contig294	19.48%	26.97%	53.55%	Both found but not overlap		
Contig295	Fickett found Glimmer not found			Both not found		
Contig296	24.57%	16.57%	58.86%	Both found but not overlap		
Contig297	Both found but not overlap			18.70%	73.74%	7.56%
Contig298	54.22%	42.76%	3.02%	41.26%	0.00%	58.74%
Contig299	5.08%	60.05%	34.87%	Both found but not overlap		
Contig300	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig301	73.30%	17.26%	9.44%	54.15%	9.41%	36.44%
Contig303	23.80%	76.20%	0.00%	8.69%	65.47%	25.84%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig304	76.33%	1.63%	22.04%	48.27%	0.00%	51.73%
Contig305	Both found but not overlap			Glimmer found Fickett not found		
Contig305_ABD	40.96%	46.93%	12.10%	40.48%	32.37%	27.14%
Contig306	Both not found			Both not found		
Contig307	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig308	26.36%	73.64%	0.00%	Both found but not overlap		
Contig309	48.06%	35.05%	16.89%	73.95%	8.64%	17.41%
Contig310	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig311	59.66%	22.62%	17.72%	33.16%	10.82%	56.01%
Contig313	41.48%	33.12%	25.40%	25.54%	31.86%	42.60%
Contig314	22.29%	77.71%	0.00%	Both found but not overlap		
Contig315	51.24%	36.34%	12.42%	29.11%	25.02%	45.87%
Contig316	81.79%	4.32%	13.89%	69.37%	2.18%	28.45%
Contig317	74.55%	25.45%	0.00%	Glimmer found Fickett not found		
Contig318	Fickett found Glimmer not found			Both not found		
Contig319	47.51%	31.19%	21.29%	40.61%	27.64%	31.74%
Contig320	74.15%	25.85%	0.00%	51.91%	20.43%	27.66%
Contig321	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig322	74.01%	16.98%	9.01%	59.57%	14.04%	26.38%
Contig325	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig326	Both found but not overlap			Glimmer found Fickett not found		
Contig327	29.83%	30.74%	39.43%	36.36%	43.72%	19.91%
Contig328	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig329	38.46%	42.54%	19.01%	31.05%	47.76%	21.19%
Contig330	54.89%	27.21%	17.90%	15.54%	17.23%	67.23%
Contig331	66.12%	24.67%	9.21%	86.44%	13.56%	0.00%
Contig332	53.63%	34.82%	11.55%	15.22%	44.16%	40.61%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig333	80.94%	17.52%	1.54%	55.57%	15.20%	29.23%
Contig334	49.86%	34.03%	16.10%	45.87%	3.98%	50.15%
Contig335	13.52%	60.36%	26.12%	52.00%	48.00%	0.00%
Contig336	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig337	52.89%	41.92%	5.19%	61.51%	30.52%	7.97%
Contig338	Glimmer found Fickett not found			Glimmer found Fickett not found		
Contig339	Fickett found Glimmer not found			Both not found		
Contig340	98.29%	0.00%	1.71%	78.47%	0.44%	21.09%
Contig341	37.96%	50.04%	12.00%	Glimmer found Fickett not found		
Contig342	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig343	78.21%	18.50%	3.28%	53.74%	2.83%	43.43%
Contig344	58.79%	34.23%	6.98%	57.17%	12.98%	29.85%
Contig345	82.32%	10.74%	6.94%	Glimmer found Fickett not found		
Contig346	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig347	58.24%	11.07%	30.69%	38.06%	8.76%	53.18%
Contig348	Fickett found Glimmer not found			Both not found		
Contig349	43.85%	36.20%	19.95%	Both found but not overlap		
Contig350	22.37%	45.42%	32.20%	Both found but not overlap		
Contig351	33.95%	66.05%	0.00%	48.73%	41.98%	9.28%
Contig352	57.10%	38.44%	4.47%	60.31%	25.72%	13.97%
Contig353	63.36%	23.86%	12.78%	52.81%	26.46%	20.72%
Contig354	51.85%	31.39%	16.76%	46.51%	35.78%	17.71%
Contig355	55.71%	0.00%	44.29%	Glimmer found Fickett not found		
Contig356	63.92%	0.00%	36.08%	Both found but not overlap		
Contig357	Both found but not overlap			Glimmer found Fickett not found		
Contig358	43.72%	30.99%	25.29%	25.51%	30.56%	43.93%
Contig359	Fickett found Glimmer not found			Both not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig360	37.48%	56.57%	5.95%	38.39%	53.82%	7.79%
Contig361	29.88%	17.11%	53.01%	Both found but not overlap		
Contig363	26.11%	36.55%	37.33%	49.31%	50.69%	0.00%
Contig364	Fickett found Glimmer not found			Both not found		
Contig365	69.91%	16.89%	13.21%	45.55%	19.91%	34.55%
Contig367	36.05%	63.44%	0.51%	36.53%	63.47%	0.00%
Contig368	72.10%	18.79%	9.11%	75.98%	7.15%	16.87%
Contig369	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig370	44.12%	0.00%	55.88%	42.39%	0.00%	57.61%
Contig371	76.00%	24.00%	0.00%	Both found but not overlap		
Contig372	28.11%	55.80%	16.08%	12.59%	21.98%	65.43%
Contig373	47.35%	47.56%	5.09%	38.35%	46.16%	15.49%
Contig374	Fickett found Glimmer not found			Both not found		
Contig375	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig376	69.04%	15.02%	15.94%	37.40%	21.07%	41.53%
Contig377	84.21%	8.29%	7.50%	51.98%	0.00%	48.02%
Contig378	52.81%	17.16%	30.03%	26.36%	9.20%	64.43%
Contig379	33.08%	66.92%	0.00%	14.81%	59.26%	25.93%
Contig380	74.44%	25.56%	0.00%	Glimmer found Fickett not found		
Contig381	56.51%	25.99%	17.50%	36.91%	47.81%	15.28%
Contig382	70.83%	22.95%	6.22%	69.04%	5.91%	25.05%
Contig383	93.15%	3.67%	3.18%	56.69%	3.19%	40.12%
Contig384	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig385	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig386	35.59%	53.69%	10.71%	Glimmer found Fickett not found		
Contig387	45.41%	36.98%	17.62%	15.93%	35.20%	48.87%
Contig388	71.03%	12.68%	16.29%	58.69%	6.13%	35.18%

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig389	77.91%	2.82%	19.27%	80.18%	1.73%	18.09%
Contig390	39.81%	44.55%	15.64%	18.69%	39.47%	41.84%
Contig391	57.56%	14.89%	27.56%	44.53%	17.28%	38.20%
Contig392	63.01%	36.99%	0.00%	47.79%	17.60%	34.62%
Contig393	12.65%	87.35%	0.00%	29.42%	70.58%	0.00%
Contig394	53.78%	23.67%	22.55%	63.69%	4.51%	31.80%
Contig395	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig396	21.22%	73.98%	4.80%	13.42%	74.48%	12.10%
Contig398	22.04%	30.01%	47.95%	Both found but not overlap		
Contig399	35.08%	54.19%	10.73%	11.52%	41.78%	46.70%
Contig400	38.59%	49.05%	12.36%	23.47%	25.22%	51.31%
Contig401	63.72%	24.02%	12.27%	57.13%	14.30%	28.57%
Contig402	53.71%	38.45%	7.84%	39.36%	22.15%	38.49%
Contig403	35.87%	51.36%	12.76%	36.83%	31.90%	31.28%
Contig404	81.40%	16.13%	2.47%	84.88%	0.00%	15.12%
Contig405	58.50%	26.08%	15.43%	18.92%	17.70%	63.38%
Contig406	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig407	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig408	40.34%	36.20%	23.46%	25.93%	11.88%	62.19%
Contig409	44.80%	55.20%	0.00%	38.62%	53.24%	8.14%
Contig410	23.94%	27.58%	48.48%	29.80%	32.92%	37.28%
Contig411	44.63%	55.37%	0.00%	18.74%	43.49%	37.77%
Contig412	35.63%	34.98%	29.39%	35.06%	28.86%	36.08%
Contig413	Both found but not overlap			Both found but not overlap		
Contig414	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig415	68.52%	10.73%	20.75%	12.12%	0.18%	87.69%
Contig416	Fickett found Glimmer not found			Fickett found Glimmer not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig417	68.35%	9.76%	21.89%	66.73%	0.00%	33.27%
Contig418	41.21%	54.97%	3.82%	42.38%	25.80%	31.82%
Contig419	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig420	Fickett found Glimmer not found			Both not found		
Contig421	62.68%	35.76%	1.56%	50.70%	17.93%	31.37%
Contig422	66.28%	13.31%	20.40%	33.37%	2.53%	64.10%
Contig423	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig424	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig425	75.17%	18.41%	6.42%	60.35%	9.35%	30.30%
Contig426	16.30%	38.37%	45.33%	Both found but not overlap		
Contig427	68.21%	30.45%	1.33%	56.57%	32.26%	11.17%
Contig428	42.60%	18.85%	38.55%	44.36%	17.48%	38.16%
Contig429	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig430	75.67%	11.30%	13.02%	48.50%	11.71%	39.79%
Contig431	40.55%	13.72%	45.73%	Both found but not overlap		
Contig432	63.00%	22.36%	14.64%	46.78%	18.72%	34.50%
Contig433	73.79%	12.41%	13.79%	Both found but not overlap		
Contig434	39.51%	53.69%	6.80%	48.76%	0.00%	51.24%
Contig435	73.25%	2.79%	23.95%	47.61%	0.43%	51.97%
Contig436	79.95%	11.78%	8.27%	64.14%	1.07%	34.79%
Contig437	Fickett found Glimmer not found			Both not found		
Contig438	60.82%	34.87%	4.31%	31.26%	51.76%	16.99%
Contig439	75.46%	10.85%	13.69%	46.78%	6.00%	47.23%
Contig440	42.01%	44.75%	13.24%	Both found but not overlap		
Contig441	35.33%	3.30%	61.37%	1.98%	32.96%	65.06%
Contig442	76.38%	19.78%	3.84%	56.94%	9.35%	33.72%
Contig443	20.62%	54.98%	24.40%	Both found but not overlap		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig444	33.05%	27.79%	39.15%	Glimmer found Fickett not found		
Contig446	50.68%	44.16%	5.16%	54.86%	28.84%	16.30%
Contig447	81.57%	15.49%	2.94%	39.97%	27.84%	32.19%
Contig448	64.04%	27.83%	8.13%	64.47%	19.81%	15.72%
Contig449	51.04%	48.30%	0.66%	49.79%	37.18%	13.03%
Contig450	24.38%	70.65%	4.97%	27.11%	61.91%	10.98%
Contig451	54.89%	31.83%	13.28%	34.14%	12.71%	53.14%
Contig452	39.23%	52.60%	8.16%	29.53%	35.24%	35.23%
Contig453	75.90%	19.54%	4.56%	41.44%	15.10%	43.46%
Contig454	54.21%	28.49%	17.30%	39.64%	19.98%	40.38%
Contig456	11.25%	88.75%	0.00%	Both found but not overlap		
Contig457	Both found but not overlap			Both found but not overlap		
Contig458	62.70%	14.35%	22.95%	42.48%	3.86%	53.66%
Contig459	15.99%	60.17%	23.84%	35.65%	62.90%	1.45%
Contig460	46.97%	45.20%	7.84%	67.99%	17.59%	14.42%
Contig461	18.54%	41.51%	39.96%	Both found but not overlap		
Contig462	64.10%	13.69%	22.21%	42.19%	8.47%	49.34%
Contig463	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig464	48.41%	23.34%	28.25%	41.99%	11.14%	46.87%
Contig465	61.56%	34.09%	4.35%	48.13%	7.05%	44.81%
Contig466	53.49%	27.59%	18.92%	42.64%	30.75%	26.61%
Contig467	71.56%	17.74%	10.71%	53.01%	23.70%	23.29%
Contig468	46.42%	7.94%	45.64%	52.47%	0.00%	47.53%
Contig469	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig470	39.36%	31.17%	29.48%	41.86%	46.51%	11.63%
Contig471	36.86%	44.36%	18.78%	51.88%	20.07%	28.05%
Contig471_ABD	Fickett found Glimmer not found			Both not found		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig472	61.82%	19.55%	18.63%	67.56%	4.45%	28.00%
Contig473	3.90%	84.85%	11.26%	Glimmer found Fickett not found		
Contig474	60.09%	26.85%	13.06%	51.44%	22.18%	26.37%
Contig475	45.57%	45.99%	8.44%	40.08%	34.65%	25.28%
Contig476	42.19%	44.44%	13.37%	14.53%	41.51%	43.95%
Contig477	24.15%	74.77%	1.08%	27.42%	63.66%	8.92%
Contig478	62.20%	33.07%	4.73%	31.06%	33.42%	35.51%
Contig479	47.10%	33.46%	19.44%	61.15%	6.75%	32.10%
Contig480	31.09%	54.66%	14.26%	65.25%	20.19%	14.55%
Contig481	59.19%	36.63%	4.18%	45.27%	26.31%	28.41%
Contig482	84.38%	13.84%	1.79%	25.00%	40.43%	34.57%
Contig483	41.62%	47.16%	11.22%	42.67%	45.78%	11.56%
Contig484	63.58%	32.32%	4.10%	52.79%	18.70%	28.51%
Contig485	88.34%	6.40%	5.26%	59.34%	9.01%	31.65%
Contig486	43.32%	35.30%	21.38%	24.07%	23.96%	51.97%
Contig487	62.55%	23.00%	14.46%	41.35%	17.64%	41.01%
Contig488	39.01%	17.64%	43.36%	56.85%	4.88%	38.27%
Contig489	62.62%	0.00%	37.38%	Both found but not overlap		
Contig490	19.62%	57.93%	22.45%	19.29%	80.49%	0.22%
Contig491	35.22%	48.83%	15.95%	41.34%	38.09%	20.57%
Contig492	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig493	52.53%	41.77%	5.71%	64.45%	9.99%	25.55%
Contig494	49.28%	31.65%	19.06%	49.86%	29.23%	20.91%
Contig495	60.22%	24.80%	14.98%	58.78%	14.53%	26.69%
Contig496	41.21%	43.19%	15.60%	23.80%	18.86%	57.34%
Contig497	44.28%	38.94%	16.78%	30.04%	27.73%	42.22%
Contig498	42.74%	25.13%	32.13%	Both found but not overlap		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig499	81.65%	5.48%	12.87%	67.70%	4.00%	28.30%
Contig500	48.95%	43.75%	7.30%	30.27%	26.88%	42.85%
Contig501	67.92%	25.90%	6.18%	75.33%	11.19%	13.48%
Contig502	32.99%	41.14%	25.86%	34.41%	15.52%	50.07%
Contig503	77.51%	15.41%	7.08%	2.17%	26.77%	71.06%
Contig504	54.57%	35.49%	9.94%	42.64%	0.00%	57.36%
Contig505	55.23%	25.63%	19.13%	46.44%	11.71%	41.84%
Contig506	37.52%	40.90%	21.58%	28.52%	37.46%	34.02%
Contig507	39.29%	49.66%	11.05%	44.36%	29.29%	26.36%
Contig508	51.68%	34.67%	13.65%	49.39%	24.12%	26.49%
Contig509	46.42%	31.25%	22.33%	39.52%	25.11%	35.37%
Contig510	56.65%	30.87%	12.49%	44.57%	28.05%	27.38%
Contig511	23.43%	47.13%	29.45%	8.60%	51.52%	39.88%
Contig512	75.62%	18.37%	6.01%	56.23%	20.85%	22.92%
Contig513	27.94%	42.10%	29.96%	12.46%	80.75%	6.79%
Contig514	68.44%	15.85%	15.72%	44.69%	14.50%	40.81%
Contig515	53.12%	41.44%	5.44%	52.31%	20.48%	27.21%
Contig516	35.58%	33.67%	30.76%	30.50%	37.06%	32.43%
Contig517	63.22%	23.87%	12.90%	43.87%	21.28%	34.86%
Contig518	65.24%	21.48%	13.28%	51.92%	15.61%	32.47%
Contig520	74.16%	7.62%	18.22%	50.72%	14.04%	35.24%
Contig521	39.19%	41.18%	19.63%	43.51%	29.09%	27.40%
Contig522	22.28%	77.72%	0.00%	15.81%	47.84%	36.34%
Contig523	Fickett found Glimmer not found			Fickett found Glimmer not found		
Contig524	49.18%	34.44%	16.37%	37.52%	31.53%	30.95%
Contig525	50.16%	46.33%	3.51%	35.20%	42.65%	22.15%
Contig526	23.98%	76.02%	0.00%	Both found but not overlap		

Name	Windows size 200			Windows size 500		
	found	over	under	found	over	under
Contig527	57.72%	13.07%	29.21%	49.62%	8.08%	42.30%
Contig528	36.51%	49.17%	14.32%	39.76%	21.22%	39.02%
Contig529	20.81%	62.99%	16.20%	33.15%	50.73%	16.12%
Contig530	52.18%	35.09%	12.73%	47.07%	27.19%	25.73%
Contig531	49.06%	33.53%	17.41%	39.80%	33.47%	26.72%
Contig532	52.76%	25.40%	21.84%	46.62%	15.00%	38.38%
Contig533	64.80%	31.84%	3.36%	41.82%	21.89%	36.29%
Contig534	63.73%	6.21%	30.06%	36.68%	2.61%	60.71%
Contig535	56.40%	19.51%	24.09%	48.27%	22.82%	28.91%
Contig536	56.55%	25.70%	17.75%	28.88%	37.66%	33.46%
Contig537	42.80%	42.95%	14.25%	35.79%	26.54%	37.67%
Contig538	74.70%	8.99%	16.31%	53.95%	1.26%	44.78%
Contig539	56.91%	26.38%	16.71%	42.07%	25.08%	32.85%
Contig540	87.19%	4.89%	7.92%	64.86%	3.65%	31.49%
Contig541	55.41%	15.02%	29.57%	25.50%	11.88%	62.63%
Contig542	65.59%	28.05%	6.36%	74.86%	14.89%	10.25%
Contig543	Both found but not overlap			Both found but not overlap		
Contig544	55.33%	30.55%	14.12%	37.82%	32.54%	29.64%
Contig545	40.15%	46.99%	12.85%	34.28%	26.53%	39.20%
Contig546	5.25%	94.75%	0.00%	3.41%	95.59%	1.00%
Contig547	46.56%	47.62%	5.82%	38.12%	43.94%	17.94%
Contig548	64.79%	14.72%	20.49%	49.55%	9.09%	41.36%
Contig549	72.89%	13.95%	13.16%	54.83%	14.69%	30.49%
Contig550	58.79%	29.12%	12.08%	43.58%	27.15%	29.27%
Average	52.12%	33.18%	14.70%	51.55%	22.16%	26.29%

79

ประวัติผู้เขียน

ชื่อ – สกุล   นาย ภานุรุจ เรืองวิเศษ

วัน เดือน ปีเกิด   22 กันยายน 2524

ประวัติการศึกษา
    พ.ศ. 2538   สำเร็จการศึกษาระดับมัธยมศึกษาตอนต้น
                    โรงเรียนรัตภูมิวิทยา จังหวัดสงขลา
    พ.ศ. 2541   สำเร็จการศึกษาระดับมัธยมศึกษาตอนปลาย
                    โรงเรียนรัตภูมิวิทยา จังหวัดสงขลา
    พ.ศ. 2546   สำเร็จการศึกษาระดับปริญญาตรี วิทยาศาสตรบัณฑิต
                    วิชาเอกวิทยาการคอมพิวเตอร์ คณะวิทยาศาสตร์
                    มหาวิทยาลัยแม่โจ้ จังหวัดเชียงใหม่

ผลงานวิจัย   Ruangviset, P., et al., 2007. The Study for Efficiency of Gene Prediction by Fickett and Glimmer Method. The 11th National Computer Science and Engineering Conference (NCSEC2007), Sripatum University, 19-21 November 2007, Thailand.