

AtADH1

Primer pair 1

	Sequence (5'->3')	Length	Tm	GC%	Self complementarity	Self 3' complementarity
Forward primer	TATTCGATGCAAAGCTGCTGTG	22	59.90	45.45	7.00	7.00
Reverse primer	CGAACTTCGTGTTTCTGCGGT	21	61.72	52.38	7.00	0.00

Products on target templates

>NM_106362.3 Arabidopsis thaliana alcohol dehydrogenase 1 (ADH1), mRNA

product length = 93

```
Forward primer 1 TATTCGATGCAAAGCTGCTGTG 22
Template      275 ..... 296
```

```
Reverse primer 1 CGAACTTCGTGTTTCTGCGGT 21
Template      367 ..... 347
```

AtHRE2

Primer pair 1

	Sequence (5'->3')	Length	Tm	GC%	Self complementarity	Self 3' complementarity
Forward primer	GAAGCGTAAACCCGTCTCAGT	21	60.34	52.38	4.00	1.00
Reverse primer	TTTGCTCGGGCACGAATCT	19	60.00	52.63	6.00	1.00

Products on target templates

>NM_130320.4 Arabidopsis thaliana Integrase-type DNA-binding superfamily protein (ERF71), mRNA

product length = 123

```
Forward primer 1 GAAGCGTAAACCCGTCTCAGT 21
Template      299 ..... 319
```

```
Reverse primer 1 TTTGCTCGGG-CACGAATCT 19
Template      422 .....T..... 403
```

product length = 123

```
Forward primer 1 GAAGCGTAAACCCGTCTCAGT 21
Template      299 ..... 319
```

```
Reverse primer 1 TTTGCTCGGG-CACGAATCT 19
Template      422 .....T..... 403
```

AtLBD16

Primer pair 1

	Sequence (5'->3')	Length	Tm	GC%	Self complementarity	Self 3' complementarity
Forward primer	TCAAACCGGAGGAGGAGTAT	20	57.46	50.00	4.00	2.00
Reverse primer	AGCCTGAAGCTCACCTAAATC	21	57.73	47.62	5.00	0.00

Products on target templates

>NM_129804.4 Arabidopsis thaliana lateral organ boundaries-domain 16 (LBD16), mRNA

product length = 112

```
Forward primer 1 TCAAACCGGAGGAGGAGTAT 20
Template      915 ..... 934
```

```
Reverse primer 1 AGCCTGAAGCTCACCTAAATC 21
Template      1026 ..... 1006
```

AtLBD18

Primer pair 1

	Sequence (5'->3')	Length	Tm	GC%	Self complementarity	Self 3' complementarity
Forward primer	GAAGTGTGTGCCGGGATGTA	20	60.04	55.00	4.00	2.00
Reverse primer	CGTTACTGGCTCCGAACACT	20	60.04	55.00	3.00	1.00

Products on target templates

>NM_180105.2 Arabidopsis thaliana LOB domain-containing protein 18 (LBD18), mRNA

product length = 98

Forward primer 1 GAAGTGTGTGCCGGGATGTA 20
Template 391 410

Reverse primer 1 CGTTACTGGCTCCGAACACT 20
Template 488 469

AtPIN1

Primer pair 1

	Sequence (5'->3')	Length	Tm	GC%	Self complementarity	Self 3' complementarity
Forward primer	ACAAAACGACGCAGGCTAAG	20	59.13	50.00	3.00	3.00
Reverse primer	AGCTGGCATTCAATGTTCC	20	56.96	45.00	6.00	1.00

Products on target templates

>NM_106017.4 Arabidopsis thaliana Auxin efflux carrier family protein (PIN1), mRNA

product length = 164

```
Forward primer 1  ACAAAAACGACGCAGGCTAAG  20
Template      1439  ..... 1458

Reverse primer 1  AGCTGGCATTCAATGTTCC  20
Template      1602  ..... 1583
```

AtRAP2.2

Primer pair 1

	Sequence (5'->3')	Length	Tm	GC%	Self complementarity	Self 3' complementarity
Forward primer	CATGGAAGAGAAGCCTCAGATG	22	58.53	50.00	4.00	3.00
Reverse primer	GCCCTGATCGGAACTGAAATA	21	57.81	47.62	4.00	2.00

Products on target templates

>NM_180251.3 Arabidopsis thaliana uncharacterized protein (RAP2.2), mRNA

product length = 103

```
Forward primer 1  CATGGAAGAGAAGCCTCAGATG  22
Template       1012 ..... 1033
```

```
Reverse primer 1  GCCCTGATCGGAACTGAAATA  21
Template       1114 ..... 1094
```

>NM_180252.1 Arabidopsis thaliana uncharacterized protein (RAP2.2), mRNA

product length = 103

```
Forward primer 1  CATGGAAGAGAAGCCTCAGATG  22
Template       847 ..... 868
```

```
Reverse primer 1  GCCCTGATCGGAACTGAAATA  21
Template       949 ..... 929
```

>NM_112281.2 Arabidopsis thaliana uncharacterized protein (RAP2.2), mRNA

product length = 103

```
Forward primer 1  CATGGAAGAGAAGCCTCAGATG  22
Template       862 ..... 883
```

```
Reverse primer 1  GCCCTGATCGGAACTGAAATA  21
Template       964 ..... 944
```

AtRAP2.12

Primer pair 1

	Sequence (5'->3')	Length	Tm	GC%	Self complementarity	Self 3' complementarity
Forward primer	TGCTGGATGTAATGGGTATCAG	22	57.64	45.45	3.00	1.00
Reverse primer	CAGAAGAGATGTCGGGAGTTATC	23	58.13	47.83	4.00	2.00

Products on target templates

>NM_001036108.3 Arabidopsis thaliana uncharacterized protein (RAP2.12), mRNA

product length = 113

```
Forward primer 1 TGCTGGATGTAATGGGTATCAG 22
Template      886 .....
```

```
Reverse primer 1 CAGAAGAGATGTCGGGAGTTATC 23
Template      998 .....
```

>NM_104269.4 Arabidopsis thaliana related to AP2 12 (RAP2.12), mRNA

product length = 113

```
Forward primer 1 TGCTGGATGTAATGGGTATCAG 22
Template      1142 .....
```

```
Reverse primer 1 CAGAAGAGATGTCGGGAGTTATC 23
Template      1254 .....
```

>NM_001084249.1 Arabidopsis thaliana uncharacterized protein (RAP2.12), mRNA

product length = 113

```
Forward primer 1 TGCTGGATGTAATGGGTATCAG 22
Template      868 .....
```

```
Reverse primer 1 CAGAAGAGATGTCGGGAGTTATC 23
Template      980 .....
```

AtTUB

Primer pair 1

	Sequence (5'→3')	Length	Tm	GC%	Self complementarity	Self 3' complementarity
Forward primer	GGTTGGTTTTGCTCCTCACC	22	61.65	54.55	2.00	0.00
Reverse primer	TAGCGTCCGTGCCTGGGTC	20	64.62	65.00	2.00	1.00

Products on target templates

>NM_125665.4 Arabidopsis thaliana tubulin beta chain 2 (TUB2), mRNA

```
product length = 129
Forward primer 1  GGTTGGTTTTGCTCCTCACC  22
Template       1044  ..... 1065

Reverse primer 1  TAGCGTCCGTGCCTGGGTC  20
Template       1172  ..... 1153
```

>NM_125664.4 Arabidopsis thaliana tubulin beta chain 2 (TUB2), mRNA

```
product length = 129
Forward primer 1  GGTTGGTTTTGCTCCTCACC  22
Template       1065  ...G..... 1086

Reverse primer 1  TAGCGTCCGTGCCTGGGTC  20
Template       1193  ..... 1174
```

>NM_128008.3 Arabidopsis thaliana tubulin beta-7 chain (TUB7), mRNA

```
product length = 129
Forward primer 1  GGTTGGTTTTGCTCCTCACC  22
Template       926  ...G..A..... 947

Reverse primer 1  TAGCGTCCGTGCCTGGGTC  20
Template       1054  ....A....T..... 1035
```

>NM_106228.3 Arabidopsis thaliana tubulin beta-1 chain (TUB1), mRNA

```
product length = 129
Forward primer 1  GGTTGGTTTTGCTCCTCACC  22
Template       1022  .....C..C.....T 1043

Reverse primer 1  TAGCGTCCGTGCCTGGGTC  20
Template       1150  ..A.....G.G...A.. 1131
```

>NM_101856.3 Arabidopsis thaliana tubulin beta-5 chain (TUB5), mRNA

```
product length = 129
Forward primer 1  GGTTGGTTTTGCTCCTCACC  22
Template       1155  ...G.....G..C.....T 1176

Reverse primer 1  TAGCGTCCGTGCCTGGGTC  20
Template       1283  ..A.....A.G...A.. 1264
```


AtUBQ

Primer pair 1		Sequence (5'->3')	Length	Tm	GC%	Self complementarity	Self 3' complementarity
Forward primer		GGCCTTGTATAATCCCTGATGAATAAG	27	59.66	40.74	5.00	5.00
Reverse primer		AAAGAGATAACAGGAACGGAAACATAGT	28	60.74	35.71	2.00	2.00
Products on target templates							
>NM_001084884.5 Arabidopsis thaliana polyubiquitin 10 (UBQ10), mRNA							
product length = 61							
Forward primer	1	GGCCTTGTATAATCCCTGATGAATAAG	27				
Template	1493	.....	1519				
Reverse primer	1	AAAGAGATAACAGGAACGGAAACATAGT	28				
Template	1553	.....	1526				
>NM_001340546.1 Arabidopsis thaliana polyubiquitin 10 (UBQ10), mRNA							
product length = 61							
Forward primer	1	GGCCTTGTATAATCCCTGATGAATAAG	27				
Template	619	.....	645				
Reverse primer	1	AAAGAGATAACAGGAACGGAAACATAGT	28				
Template	679	.....	652				
>NM_001340547.1 Arabidopsis thaliana polyubiquitin 10 (UBQ10), mRNA							
product length = 61							
Forward primer	1	GGCCTTGTATAATCCCTGATGAATAAG	27				
Template	1058	.....	1084				
Reverse primer	1	AAAGAGATAACAGGAACGGAAACATAGT	28				
Template	1118	.....	1091				
>NM_178968.5 Arabidopsis thaliana polyubiquitin 10 (UBQ10), mRNA							
product length = 61							
Forward primer	1	GGCCTTGTATAATCCCTGATGAATAAG	27				
Template	1724	.....	1750				
Reverse primer	1	AAAGAGATAACAGGAACGGAAACATAGT	28				
Template	1784	.....	1757				
>NM_116771.5 Arabidopsis thaliana polyubiquitin 10 (UBQ10), mRNA							
product length = 61							
Forward primer	1	GGCCTTGTATAATCCCTGATGAATAAG	27				
Template	1303	.....	1329				
Reverse primer	1	AAAGAGATAACAGGAACGGAAACATAGT	28				
Template	1363	.....	1336				
>NM_202787.4 Arabidopsis thaliana polyubiquitin 10 (UBQ10), mRNA							
product length = 61							
Forward primer	1	GGCCTTGTATAATCCCTGATGAATAAG	27				
Template	1075	.....	1101				
Reverse primer	1	AAAGAGATAACAGGAACGGAAACATAGT	28				
Template	1135	.....	1108				
>NM_178970.5 Arabidopsis thaliana polyubiquitin 10 (UBQ10), mRNA							
product length = 61							
Forward primer	1	GGCCTTGTATAATCCCTGATGAATAAG	27				
Template	1496	.....	1522				
Reverse primer	1	AAAGAGATAACAGGAACGGAAACATAGT	28				
Template	1556	.....	1529				