Bellwork Hon Alg 2 Tuesday, October 25, 2016

Factor each completely.

1. $3a^4 - 34a^2 + 63$

2. $24c^5 - 68c^3d^3 - 56cd^6$

3. $\frac{27}{16}Q^2 - \frac{3}{25}$

Bellwork Hon Alg 2 Tuesday, October 25, 2016 Answers

Factor each completely.

1. $3a^4 - 34a^2 + 63$

189

-27 -7

-34

	a^2	-9
$3a^2$	$3a^4$	$-27a^2$
-7	$-7a^2$	$+63$

$(a^2 - 9)(3a^2 - 7)$

$(a \pm 3)(3a^2 - 7)$

2. $24c^5 - 68c^3d^3 - 56cd^6$

$4c(6c^4 - 17c^2d^3 - 14d^6)$

-84

-21 +4

-17

	$2c^2$	$-7d^3$
$3c^2$	$6c^4$	$-21c^2d^3$
$+2d^3$	$14c^2d^3$	$-14d^6$

$4c(3c^2 + 2d^3)(2c^2 - 7d^3)$

3. $\frac{27}{16}Q^2 - \frac{3}{25}$

$3\left[\frac{9}{16}Q^2 - \frac{1}{25}\right]$

$3\left(\frac{3}{4}Q \pm \frac{1}{5}\right)$