

Pr. 1 Urč hodnotu výrazu

a)  $x+2y$   $x=3, y=-2.$

b)  $2(x-y)+5$   $x=-1, y=1$

c)  $5-(3x+2)$   $x=0$

d)  $(x-4)+2(3-x)$   $x=4$

e)  $3x-5(x-3)$   $x=3$

f)  $0,5x-5y-1$   $x=10, y=2$

Pr.2 Uprav výraz

a)  $4.(a+1)-2(a+3)-(-1)=$

b)  $3(x-y)-2(x-7)=$

c)  $-2(x+y)+4(x-5)-3(-2-y)=$

d)  $-4a-5(a+b)-4b=$

e)  $3a-4b-2c-4(a-b-4-4c)=$

f)  $-8a-8b-8(-a+7)=$

g)  $-(-3y-1)-(-5y-10):5=$

h)  $24x-(4x-8y):2-16y=$

Pr.3 Uprav a urč hodnotu výrazu:

a)  $[5x+3y+(-5+x-4y)+4x].2=$

$x=2; y=-2$

b)  $8+[4a-5-3b+2(3a-2b)]=$

$a=3; b=2$

c)  $3(5m+5+3n)-2(2m+4n+8)=$

$m=3; n=-1$

d)  $(2p-4r+7)-2(-8p-4r-2)=$

$p=1; r=-1$

Riešenie:

Pr. 1

a)  $3+2 \cdot (-2)=3-4=-1$

b)  $2(-1-1)+5=2 \cdot (-2)+5=-4+5=1$

c)  $5-(3 \cdot 0+2)=5-2=3$

d)  $(4-4)+2(3-4)=0+2 \cdot (-1)=-2$

e)  $3 \cdot 3-5(3-3)=9-5 \cdot 0=9$

f)  $0,5 \cdot 10-5 \cdot 2-1=5-10-1=-6$

Pr.2 Vypočítaj

a)  $4 \cdot (a+1)-2(a+3)-(-1)=4a+4-2a-6+1=2a-1$

b)  $3(x-y)-2(x-7)=3x-3y-2x+14=x-3y+14$

c)  $-2(x+y)+4(x-5)-3(-2-y)=-2x-2y+4x-20+6+3y=2x+y-14$

d)  $-4a-5(a+b)-4b=-4a-5a-5b-4b=-9a-9b$

e)  $3a-4b-2c-4(a-b-4c)=3a-4b-2c-4a+4b+16+16c=-a+14c+16$

f)  $-8a-8b-8(-a+7)=-8a-8b+8a-56=-8b-56$

g)  $-(-3y-1)-(-5y-10):5=3y+1+y+2=4y+3$

h)  $24x-(4x-8y):2-16y=24x-2x+4y-16y=22x-12y$

Pr.3

a)  $[5x+3y+(-5+x-4y)+4x] \cdot 2=[5x+3y-5+x-4y+4x] \cdot 2=[10x-y-5] \cdot 2=20x-2y-10=$   
 $=20 \cdot 2-2 \cdot (-2)-10=40+4-10=34$

b)  $8+[4a-5-3b+2(3a-2b)]=8+[4a-5-3b+6a-4b]=8+10a-7b-5=10a-7b+3=$   
 $=10 \cdot 3-7 \cdot 2+3=30-14+3=19$

c)  $3(5m+5+3n)-2(2m+4n+8)=15m+15+9n-4m-8n-16=11m+n-1=$   
 $=11 \cdot 3-(-1)-1=33+1-1=33$

d)  $(2p-4r+7)-2(-8p-4r-2)=2p-4r+7+16p+8r+4=18p+4r+11=18 \cdot 1+4 \cdot (-1)+11=18-4+11=25$