

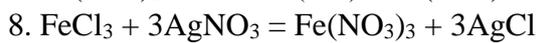
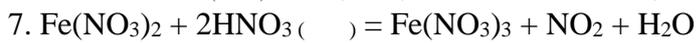
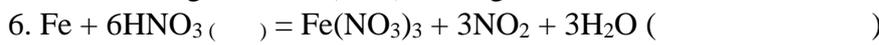
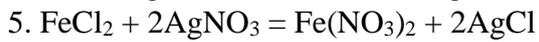
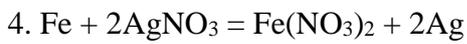
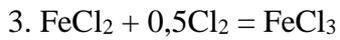
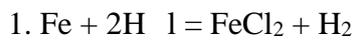
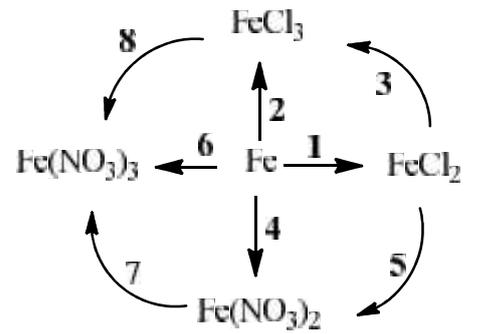
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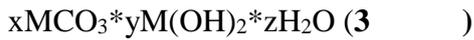
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2.

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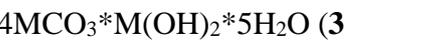
) 1,000 ; 0,037 ,  
 ) ;  
 ) 0,148 ;  
 ) ; 2,4 ;  
 ) 1,000 200 0,1  
 198,7 ( .20<sup>0</sup> ).  
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0,185 (0,0103 ) 1,000  
 :  
 $v = 0,1987 \cdot 273,15 : 22,4 : 293,15 = 0,0083$  . (2 )  
 5:4. (2 )

1,000 - (0,037 + 0,148 ) - 1:2,4 - 0,0083\*44 = 0,033 , 0,0018 . (2 )



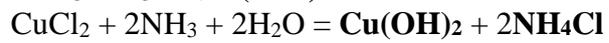
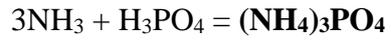
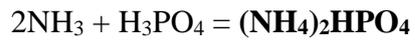
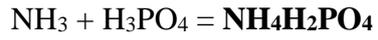
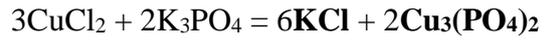
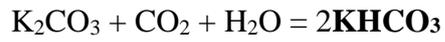
1:2,4:0,0103 = 40,45 / . (2 )  
 , . . . , 0,0103 .  
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( 20 ).

4.

$n$   
 $(n = 1, 2, 3, \dots)$   
 $l = 0, 1, 2, \dots, n-1$   
 $m_l = -l, -(l-1), \dots, 0, \dots, (l-1), l$   
 $m_s = \pm 1/2$

$n = 1, 2, 3, \dots$   
 $l = 0, 1, 2, \dots (n-1)$   
 $m_l = -(l+1) \dots (l+1)$   
 $m_s = \pm 1/2$

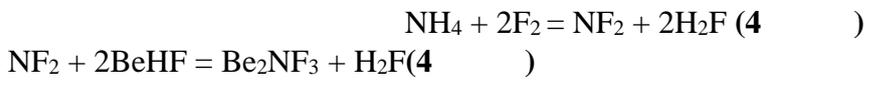
- 1)
- 2)
- 3)

(20)

$(1, 0, -1, 1/2), (1, 0, 0, 1/2), (1, 0, 1, 1/2)$  (2)  
 $(2, 0, -1, 1/2), (2, 0, 0, 1/2), (2, 0, 1, 1/2), (2, 1, -2, 1/2), (2, 1, -1, 1/2), (2, 1, 0, 1/2), (2, 1, 1, 1/2), (2, 1, 2, 1/2)$  (2)

H	He	Li					
Be	B	C	N	O	F	Ne	Na

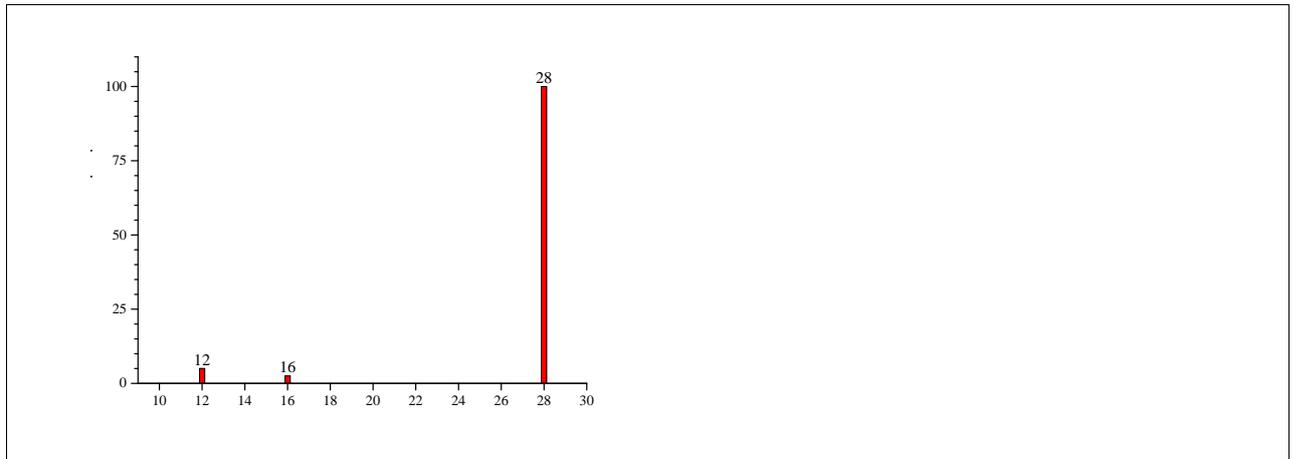
( 3 ) ( 2 )



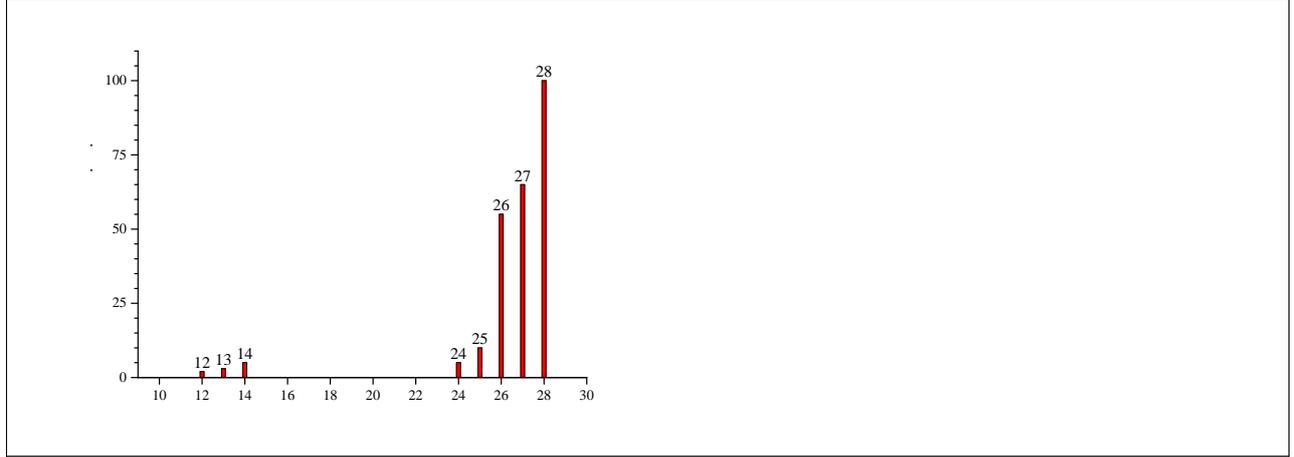
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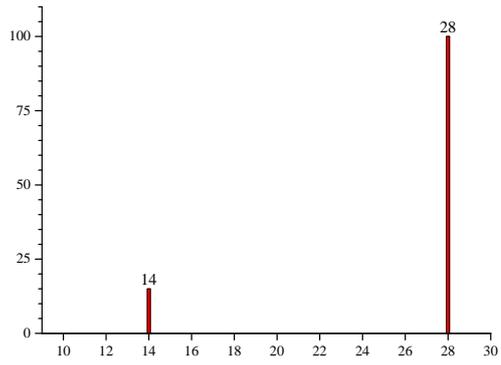
	%		%
$^1\text{H}$	99.9	$^{14}\text{N}$	99.6
$^2\text{D}$	<1	$^{15}\text{N}$	<1
$^{10}\text{B}$	20	$^{16}\text{O}$	99.9
$^{11}\text{B}$	80	$^{17}\text{O}$	<1
$^{12}\text{C}$	98.9	$^{18}\text{O}$	<1
$^{13}\text{C}$	1.1		



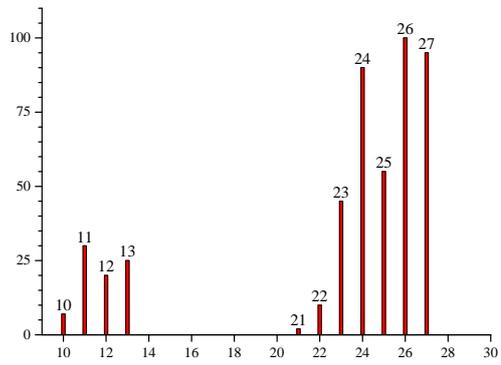
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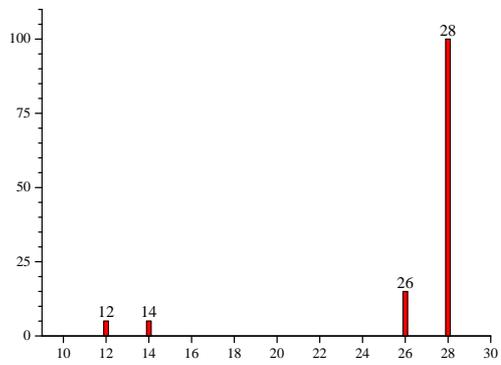
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28 ( ) (2 ).

14. (2 )

( 16 14 ) , (2 )

1 24, 1,

-  $^{2+}CH_{12}^{+}$   $^{14}$  ) (4

)

$B_2H_6$ . (2 )  $^{10}B$   $^{11}B$ .

), (2 ) )

- 28. 2

(2 ) - 12 -

14  $^{28-12-2=14}$   $CD^+$

-  $DCN$ . (4 )