

Electronic Configuration

Maximum no. of electron in each shell = $2n^2$

Find the number of electron in shell no. 4, 9, 11, 15, 20.

Electronic configuration of Na: 2, 8, 1

Electronic configuration of Cl: 2, 8, 7

Electronic configuration of Ca: 2, 8, 8, 2

Electronic configuration of Si: 2, 8, 4

Now we will divide shell into subshells.

First shell has one subshell called as **s**

Second shell has two subshell called as **s, p**

Third shell has three subshell called as **s, p, d**

Fourth shell has four shell called as **s, p, d, f**

Fifth shell has five shell called as **s, p, d, f, g** and so on....

Fifth floor	S	p	p	p	d	d	d	d	d	f	f	f	f	f	f	f	g	g	g	g	g	g	g	g	g
Fourth floor	s	p	p	p	d	d	d	d	d	f	f	f	f	f	f	f									
Third floor	s	p	p	p	d	d	d	d	d																
Second floor	s	p	p	p																					
First floor	s																								

Address of the Flats

First floor: 1s

Second floor: 2s, 2p

Third floor: 3s, 3p, 3d

Fourth floor: 4s, 4p, 4d, 4f

Fifth floor: 5s, 5p, 5d, 5f, 5g

Sixth floor: 6s, 6p,

Find the address of the following flats: 3s, 7d, 9p, 13f, 11g

No. of people a room can accommodate is 2

No. of people for s type flat is 2

No. of people for p type flat is 6

No. of people for d type flat is 10

No. of people for f type flat is 14

No. of people for g type flat is 18

1s 2s 2p 3s 3p 4s 3d 4p 5s 4d 5p 6s 4f 5d 6p 7s 5f
6d 7p 8s 5g 6f 7d 8p 9s

Electronic configuration:

Ca

$1s^2 2s^2 2p^6 3s^2 3p^6 4s^2$

2, 8, 8, 2

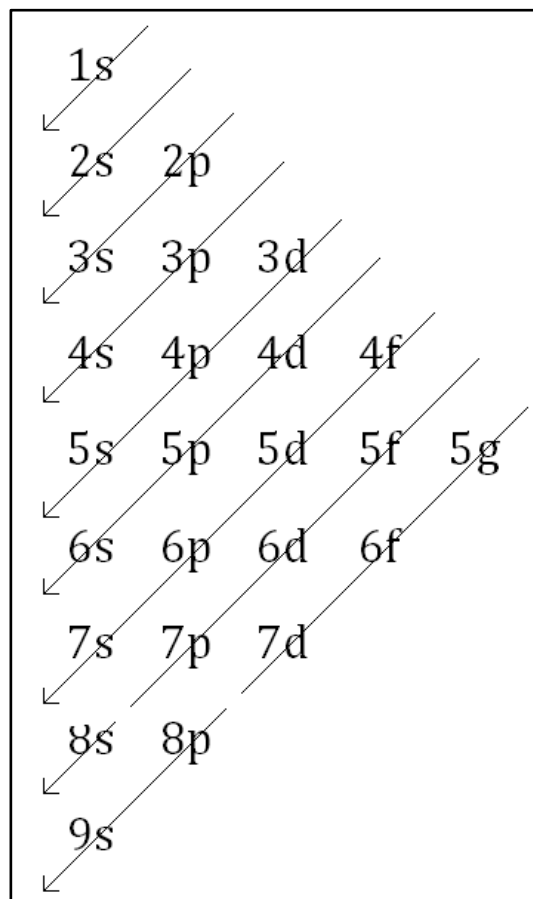
Fe (26)

$1s^2 2s^2 2p^6 3s^2 3p^6 4s^2 3d^6$

2, 8, 14, 2

Find the electronic configuration of

8, 13, 17, 19, 23, 28, 33, 40, 53, 79, 92, 117, 152



Find the electronic configuration of:

1, 2, 5, 9, 15, 18, 25, 39, 44, 47, 51, 57, 65, 69, 73, 77, 81, 89, 95, 99, 103, 107, 113, 118,
123, 129, 132, 138, 146, 150, 158, 166, 170