Name.....Number.....Class.....

SPECIFIC LATENT HEAT Worksheet

■ Q= ML

Questions

1. Calculate the specific latent heat of fusion if:

   a. 28,000 J is supplied to turn 2 kg of solid oxygen into a liquid at -219°C

Formula Q = ml

Q =

M =

l=

We get

=

Ans

   b. 183,600 J is supplied to turn 3.4 kg of solid sulphur into a liquid at 115°C

Formula Q = ml

Q =

M =

l=

We get

=

Ans

LIVEWORKSHEETS

Name.....Number.....Class.....

SPECIFIC LATENT HEAT Worksheet

■ Q= ML

c. 6600 J is supplied to turn 600g of solid mercury into a liquid at -39°C

Formula Q = ml

Q =

M =

l=

We get

=

Ans

d. 67,000 J is supplied to turn 200 g of ice into a liquid at 0°C

Formula Q = ml

Q =

M =

l=

We get

=

Ans

LIVEWORKSHEETS

Name.....Number.....Class.....

SPECIFIC LATENT HEAT Worksheet

■ Q= ML

2. Calculate the specific latent heat of vaporization if:

a. 335,200 J is supplied to turn 400 g of liquid ethanol into a gas at 78°C

Formula Q = ml

Q =

M =

l=

We get

=

Ans

b. 987,800 J is supplied to turn 2.2 kg of liquid hydrogen into a gas at -253°C

Formula Q = ml

Q =

M =

l=

We get

=

Ans

LIVEWORKSHEETS

Name.....Number.....Class.....

SPECIFIC LATENT HEAT Worksheet

■ Q= ML

c. 53.25 kJ is supplied to turn 250 g of liquid oxygen into a gas at -183°C

Formula Q = ml

Q =

M =

l=

We get

=

Ans

d. 7,620 J is supplied to turn 30 g of liquid chloroform into a gas at 62°C

Formula Q = ml

Q =

M =

l=

We get

=

Ans

LIVEWORKSHEETS

Name.....Number.....Class.....

SPECIFIC LATENT HEAT Worksheet

■ Q= ML

3. How much energy is needed to turn 2 kg of water, at 100°C into steam at 100°C? (specific latent heats of steam 2256 kJ/Kg)

Formula Q = ml

Q =

M =

l=

We get

=

Ans

4. How much heat energy is given out when 500 g of steam at 100°C condensation at 100°C? (specific latent heats of condensation 2256 kJ/Kg)

Formula Q = ml

Q =

M =

l=

We get

=

Ans

LIVEWORKSHEETS