

Gwybodaeth i rieni – Mathemateg a Rhifedd
Information to Parents – Mathematics and Numeracy

4 arholiad – 2 Rhifedd

2 Mathemateg

Dyfarnu 2 radd TGAU, posib i'r ddwy radd fod yn wahanol

3 Haen -	Uwch	A* – C
	Canolradd	B – E
	Sylfaenol	D – G

Mae posib cofrestru ar gyfer
dwy haen wahanol mewn
Rhifedd / Mathemateg

4 exams - 2 Numeracy

2 Mathematics

Awards 2 GCSE grades, possible for two grades to be different

3 Tiers -	Higher	A* – C
	Intermediate	B – E
	Foundation	D – G

It is possible to be entered
for two different tiers in
Numeracy / Mathematics

RHIFEDD

“...asesu'r fathemateg y bydd ei hangen ar ddysgwyr yn eu bywydau bob dydd, ym myd gwaith, ac ym meysydd eraill y cwricwlwm...”

NUMERACY

“...assess the mathematics that learners will need in their everyday lives, in the world of work, and in other general curriculum areas...”

MATHEMATEG

“...bydd TGAU Mathemateg yn cynnwys yr agweddau hynny ar fathemateg sy'n angenrheidiol i symud ymlaen i astudiaeth wyddonol, dechnegol neu bellach mewn mathemateg.”

MATHEMATICS

“...GCSE Mathematics will extend to aspects of mathematics needed for progression to scientific, technical or further mathematical study.”

Adnoddau / Resources:

vle.mathswatch.com

mathemateg.com

Unrhyw gwestiynau / Any questions

bej@dyffrynconwy.conwy.sch.uk

Arholiadau Rhifedd a Mathemateg
Numeracy and Mathematics Exams

Blwyddyn 11 / Year 11

	Tachwedd 2017 November 2017	Haf 2018 Summer 2018
Rhifedd Numeracy	Ail-sefyll / Re-sit Uned / Unit 1 - 06/11/17 Uned / Unit 2 - 08/11/17	Ail-sefyll / Re-sit Uned / Unit 1 - 08/05/18 Uned / Unit 2 - 10/05/18
Mathemateg Mathematics	Unigolion / Individuals Uned 1 / Unit 1 - 10/11/17 Uned 2 / Unit 2 - 13/11/17	Uned / Unit 1 - 24/05/18 Uned / Unit 2 - 07/06/18

Adolygu Rhifedd (blwyddyn 11)
Numeracy Revision (year 11)

27/10/17 – trwy'r dydd – pawb sy'n ail-sefyll
all day – everyone re-sitting

03/11/17 – 10.00-14.30 grŵp targed (canolradd)
target group (intermediate)

Blwyddyn 10 / Year 10

	Haf 2018 Summer 2018	Tachwedd 2018 November 2018	Haf 2019 Summer 2019
Rhifedd Numeracy	Ffug arholiad Mock exam	Ffug arholiad Mock exam (unigolion yn sefyll arholiad) (individuals sitting the exam)	Pawb Everyone
Mathemateg Mathematics			Pawb Everyone

Haen Sylfaenol / Foundation Tier

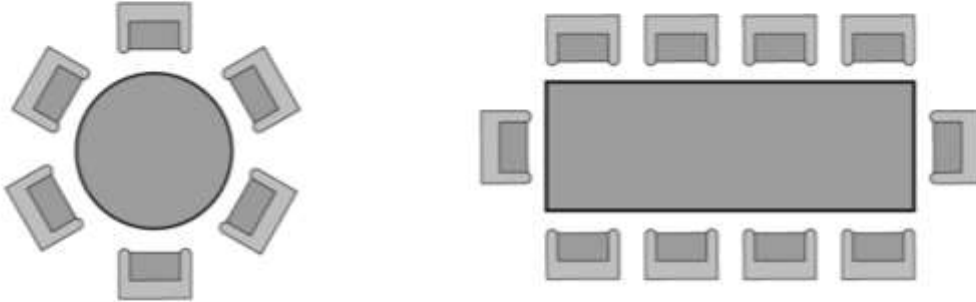
1)

Yn y cwestiwn hwn, cewch eich asesu ar ansawdd eich trefnu, cyfathrebu a chywirdeb wrth ysgrifennu.

Mae Aled yn trefnu parti Nadolig.

Mae e'n penderfynu defnyddio *Table Toppers* i gael byrddau, cadeiriau a bwyd.

Mae lle i 6 o bobl eistedd wrth bob bwrdd crwn, ac mae lle i 10 o bobl eistedd wrth bob bwrdd petryal.



Mae prisiau *Table Toppers* i'w gweld isod.

<i>Table Toppers</i>		
Ffioedd Llogi (<i>hiring</i>)	Byrddau crwn	£3 yr un
	Byrddau petryal	£4 yr un
	Cadeiriau	£2 yr un
Bwyd	Bwffe	£9 y person
	Mochyn Rhost	£12 y person

Bydd digon o le i'r holl bobl sy'n dod i'r parti eistedd o amgylch 3 bwrdd crwn a 2 fwrdd petryal. Ni fydd dim seddi sbâr.

Mae Aled yn llogi 3 bwrdd crwn, 2 fwrdd petryal, a chadair ar gyfer pob person yn y parti. Mae e'n penderfynu cynnig pryd bwffe ar gyfer pob person.

Faint yw'r cyfanswm mae *Table Toppers* yn ei godi ar (*charge*) Aled?
Rhaid i chi ddangos eich holl waith cyfrifo.

[6 + 2 TCY]

2)

Yn y rhan hon o'r cwestiwn, cewch eich asesu ar ansawdd eich trefnu, cyfathrebu a chywirdeb wrth ysgrifennu.

Mae'n costio £2.35 i Delyth wneud pob kannwyll fach.

Mae'n costio 15c i wneud pob blwch.

Mae Delyth yn gwerthu 20 kannwyll am gyfanswm o £84. Mae pob kannwyll mewn blwch gwahanol.

Faint o elw mae Delyth yn ei wneud?

Rhaid i chi ddangos eich holl waith cyfrifo.

[3 + 2 TCY]

Haen Sylfaenol / Foundation Tier

1)

In this question, you will be assessed on the quality of your organisation, communication and accuracy in writing.

Aled plans a Christmas party.

He decides to use *Table Toppers* to supply tables, chairs and catering.

The circular tables each seat 6 people and the rectangular tables each seat 10 people.

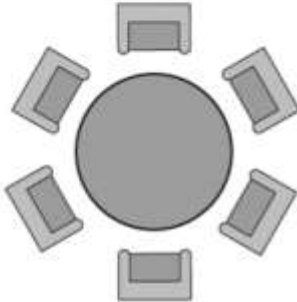


Table Toppers charge as shown below.

<i>Table Toppers</i>		
Hiring Fees	Circular tables	£3 each
	Rectangular tables	£4 each
	Chairs	£2 each
Catering	Buffet	£9 per person
	Hog Roast	£12 per person

All the people invited to the party will fit around 3 circular tables and 2 rectangular tables. There will be no spare seats.

Aled hires 3 circular tables, 2 rectangular tables, and a chair for each person at the party. He decides to provide a buffet meal for each person.

How much does *Table Toppers* charge Aled in total?
You must show all your working.

[6 + 2 OCW]

2)

In this part of the question, you will be assessed on the quality of your organisation, communication and accuracy in writing.

It costs Delyth £2.35 to make each small candle.

It costs 15p to make each box.

Delyth sells 20 candles, each in a separate box, for a total of £84.

How much profit does Delyth make?

You must show all your working.

[3 + 2 OCW]

Haen Ganolradd / Intermediate Tier

1)

Mae Loretta'n cael ei thalu mewn ewros.
Mae hi'n gwirio (*checking*) ei bil treth ar gyfer llynedd.

Dyma gyfraddau treth llynedd:

- Dim treth ar y €3500 cyntaf o enillion (*earnings*)
- Enillion dros €3500 ac i fyny at €10 500: cael eu trethu ar gyfradd o 25%
- Enillion yn uwch na €10 500: cael eu trethu ar gyfradd o 35%

Llynedd, cyfanswm enillion Loretta cyn treth oedd €34 500.

Faint oedd cyfanswm y dreth roedd Loretta wedi'i thalu?
Rhaid i chi ddangos eich holl waith cyfrifo.

[6]

2)

Yn y rhan hon o'r cwestiwn, cewch eich asesu ar ansawdd eich trefnu, cyfathrebu a chywirdeb wrth ysgrifennu.

Cerdyn Rheilffordd ar gyfer pobl 16 i 25 oed
£30 am flwyddyn
Cael $\frac{1}{3}$ i ffwrdd o'ch holl deithio ar y rheilffyrdd

Mae Nerys ac Eleri yn ddwy chwaer.
Mae Nerys yn 22 oed ac mae Eleri yn 27 oed.

Mae'r ddwy chwaer yn byw yng Nghaergybi.
Mae eu modryb yn byw yn Aberdaugleddau.
Maen nhw'n teithio ar y trên i ymweld â'u modryb 3 gwaith y flwyddyn.

Mae Nerys yn prynu Cerdyn Rheilffordd 16-25 i'w ddefnyddio ar gyfer y teithiau hyn.
Maen nhw'n prynu tocynnau trên unffordd ar gyfer pob taith.
Cost tocyn trên **unffordd** o Gaergybi i Aberdaugleddau yw £84.50.
Mae'r daith adref o Aberdaugleddau hefyd yn costio £84.50 y tocyn.

Mewn blwyddyn, faint yn llai mae Nerys yn ei dalu nag Eleri am y teithiau i Aberdaugleddau ac yn ôl?
Rhaid i chi ddangos eich holl waith cyfrifo.

[5 + 2 TCY]

3)

Mae pris pren meddal yn newid bob blwyddyn.
Mae'r pris wedi cynyddu 6% y flwyddyn am bob un o'r **5 mlynedd** diwethaf.
Cyn hynny, roedd y pris wedi gostwng 2% y flwyddyn.
Saith mlynedd yn ôl, pris pren meddal oedd £34 y m³.

Cyfrifwch bris pren meddal ar hyn o bryd.

[3]

Haen Ganolradd / Intermediate Tier

1)

Loretta is paid in euros.
She is checking her tax bill for last year.

The tax rates last year were as follows:

- No tax on the first €3500 of earnings
- Earnings in excess of €3500 and up to €10 500: taxed at a rate of 25%
- Earnings above €10 500: taxed at a rate of 35%

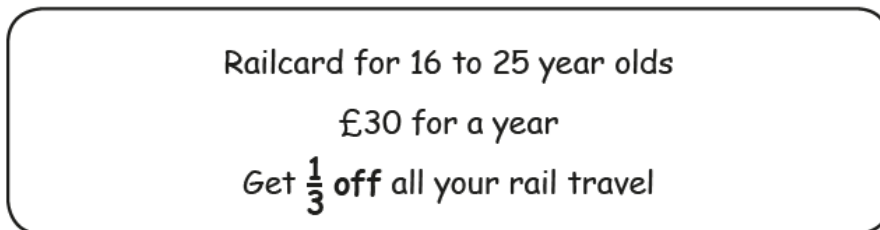
Last year, Loretta's total earnings before tax were €34 500.

How much tax did Loretta pay in total?
You must show all your working.

[6]

2)

In this part of the question, you will be assessed on the quality of your organisation, communication and accuracy in writing.



Nerys and Eleri are sisters.
Nerys is 22 years old and Eleri is 27 years old.

The two sisters live in Holyhead.
Their aunt lives in Milford Haven.
They travel by train to visit their aunt 3 times a year.

Nerys buys a 16-25 Railcard to use for these journeys.
They buy single rail tickets for each journey.
The cost of a **single** rail ticket from Holyhead to Milford Haven is £84.50.
The journey home from Milford Haven also costs £84.50 per ticket.

In a year, how much less does Nerys pay than Eleri for the journeys to Milford Haven and back?

You must show all your working.

[5 + 2 OCW]

3)

The price of softwood changes each year.
The price has increased by 6% per annum for each of the last **5 years**.
Before this, the price had decreased by 2% per annum.
Seven years ago the price of softwood was £34 per m³.

Calculate the current price of softwood.

[3]

Haen Uwch / Higher Tier

1)

Mae Fatima eisiau buddsoddi rhywfaint o arian mewn cyfrif cynilo.

Mae hi wedi cymryd taflenni o ddwy gymdeithas adeiladu sy'n hysbysebu eu cyfrifon cynilo llog-uchel.

Cyfrif 'Bannau'

Cyfradd enwol flynyddol o
3.85%

Talu llog yn fisol

Cyfrif 'Eryri'

Cyfradd enwol flynyddol o
3.86%

Talu llog bob 6 mis

Drwy gymharu AERs, pa gyfrif fydd yn cynnig y gyfradd llog orau i Fatima ar ei buddsoddiad? Rhaid i chi ddangos eich holl waith cyfrifo. [5]

2)

Mae Gwenda'n mwynhau rhedeg ar y ffyrdd.

(a) *Yn y rhan hon o'r cwestiwn, cewch eich asesu ar ansawdd eich trefnu, cyfathrebu a chywirdeb wrth ysgrifennu.*

Mae hi'n cadw cofnod o'i rhediad bob dydd yr wythnos hon.

Dydd	Sul	Llun	Maw	Mer	Iau	Gwe	Sad
Pellter	4.6 km	5.4 km	2.2 km	6.2 km	7.2 km	2.2 km	3.4 km
Amser	26 mun	31 mun	12 mun	35 mun	40 mun	14 mun	22 mun

Yr wythnos diwethaf, ei buanedd cyfartalog am yr wythnos oedd 9.6 cilometr yr awr.

Cyfrifwch welliant canrannol Gwenda yn ei buanedd cyfartalog o'r wythnos diwethaf i'r wythnos hon.

Rhaid i chi ddangos eich holl waith cyfrifo.

[6 + 2 TCY]

3)

Ar stad dai newydd, mae timau o beintwyr yn peintio waliau a nenfydau (*ceilings*) y tai ar ôl iddyn nhw gael eu hadeiladu.

(a) Mae'n cymryd tim o 5 peintiwr 10 awr i beintio tŷ lle mai arwynebedd cyfan y waliau a'r nenfydau yw 500 m².

Arwynebedd cyfan waliau a nenfydau tŷ newydd ar y stad yw 600 m².

Rhaid i'r tŷ hwn gael ei beintio mewn 8 awr.

Cyfrifwch y nifer lleiaf o beintwyr sy'n angenrheidiol.

Rhaid i chi ddangos eich holl waith cyfrifo.

[4]

Haen Uwch / Higher Tier

1)

Fatima wants to invest some money in a savings account. She has picked up leaflets from two building societies advertising their high-interest savings accounts.

'Bannau' account

Nominal annual rate of
3.85%

Interest paid monthly

'Eryri' account

Nominal annual rate of
3.86%

Interest paid every
6 months

By comparing AERs, which account will offer Fatima the better interest rate on her investment? You must show all your working. [5]

2)

Gwenda enjoys road running.

(a) *In this part of the question, you will be assessed on the quality of your organisation, communication and accuracy in writing.*

She keeps a record of her run each day this week.

Day	Sun	Mon	Tues	Wed	Thurs	Fri	Sat
Distance	4.6 km	5.4 km	2.2 km	6.2 km	7.2 km	2.2 km	3.4 km
Time	26 mins	31 mins	12 mins	35 mins	40 mins	14 mins	22 mins

Last week, her average speed for the week was 9.6 kilometres per hour. Calculate Gwenda's percentage improvement in her average speed from last week to this week. You must show all your working. [6 + 2 OCW]

3)

On a new housing estate, teams of painters paint the walls and ceilings of houses once they are built.

(a) It takes a team of 5 painters 10 hours to paint a house that has a total wall and ceiling area of 500 m².

A new house on the estate has a total wall and ceiling area of 600 m². This house has to be painted in 8 hours.

Calculate the least number of painters needed. You must show all your working.

[4]