

**MATRICULATION EXAMINATION  
L-EZAMI TAL-MATRIKOLA**

**INTERMEDIATE LEVEL  
IL-LIVELL INTERMEDJU  
SEPTEMBER 2014  
SETTEMBRU 2014**

**SUBJECT:** SYSTEMS OF KNOWLEDGE  
**DATE:** 1st September 2014  
**TIME:** 9.00 a.m. to 12.00 noon

**IS-SUĞGETT:** L-OQSMA TAL-GħERF  
**ID-DATA:** l-1 ta' Settembru 2014  
**IL-HIN:** mid-9.00 ta' filghodu sa nofsinhar

**Answer 4 questions, one from each section.**

You may answer in either English or Maltese.

This paper carries 60% of the global mark.

Each question carries 25 marks.

Each question should be discussed and the arguments clearly made.

Make sure you discuss each question fully.

Answers that are out of point (not relevant to the question) will not be considered.

You are kindly asked to write each answer on a different booklet. Indicate the section and question number clearly in each booklet.

***Wieġeb 4 mistoqsijiet, waħda minn kull taqsima.***

***Tista' twieġeb bl-Ingliz jew bil-Malti.***

***Il-marki ta' din il-karta jammontaw għal 60% tal-marka globali.***

***Kull mistoqsija fiha 25 marka.***

***Kull mistoqsija trid tiġi diskussa b'argamenti ċari.***

***Kun żgur li twieġeb kull mistoqsija b'mod shiħ.***

***Tweġibiet li ma jkunux relevanti għall-mistoqsija ma jiġux ikkonsidrati.***

***Jekk jogħgbok ikteb kull tweġiba fuq skript differenti. Uri t-taqsima u n-numru ta' kull mistoqsija b'mod ċar fuq kull skript.***

## Section A/*Taqsim A*

### Either/Jew

- 1** “Many forms of Government have been tried, and will be tried in this world of sin and woe. No one pretends that democracy is perfect or all-wise. Indeed, it has been said that democracy is the worst form of Government except for all those other forms that have been tried from time to time.”

*(Winston Churchill: Speech in the House of Commons, 11 November 1947)*

Discuss.

“Il-bniedem ipprova bosta forom ta’ Gvern, u jibqa’ jipprova f’din id-dinja ta’ dnub u niket. Hadd ma jippretendi li d-demokrazija hija perfetta jew li taf kollox. Veru, intqal li d-demokrazija hija l-agħar forma ta’ Gvern ħlief għal dawk il-forom l-oħra kollha li l-bniedem ipprova minn żmien għal ieħor.”

*(Winston Churchill: Speech fil-House of Commons, 11 ta’ Novembru 1947)*

Iddiskuti.

### Or/Jew

- 2** “A perfect democracy, a ‘warm body’ democracy in which every adult may vote and all votes count equally, has no internal feedback for self-correction. It depends solely on the wisdom and self-restraint of citizens . . . which is opposed by the folly and lack of self-restraint of other citizens. What is supposed to happen in a democracy is that each sovereign citizen will always vote in the public interest for the safety and welfare of all. But what does happen is that he votes his own self-interest as he sees it . . .” *(Robert A. Heinlein)*  
Is the will of the majority always the best for the common good? What could be the matter with each person voting for his/her own self-interest? Discuss.

“Demokrazija perfetta, demokrazija ‘b’għisem shun’ li fiha kull adult jista’ jivvota u l-voti kollha jgħoddu ndaqs, m’għandhiex feedback intern biex tikkoreġi lilha nnifisha. Tiddeperi għal kollox fuq l-għaqal taċ-ċittadini u t-trażżeen tagħhom infušhom . . . (ħaġa) li hi attakkata mill-istupidaġni u n-nuqqas ta’ trażżeen ta’ ċittadini oħra. Dak li suppost iseħħi f’demokrazija huwa li kull ċittadin sovran dejjem jivvota fl-interess pubbliku għall-harsien u l-ġid ta’ kulħadd. Imma dak li jiġri huwa li jivvota għall-interessi tiegħi nnifsu kif jarahom hu . . .” *(Robert A. Heinlein)*

*Ir-rieda tal-maġgoranza hija dejjem l-aħjar għall-ġid komuni? X’jiġri jekk kulħadd jivvota għall-interessi tiegħi nnifsu? Iddiskuti.*

## Section B/*Taqsim B*

### Either/Jew

- 1** “The differences between revolution in art and revolution in politics are enormous. Revolution in art lies not in the will to destroy but in the revelation of what has already been destroyed. Art kills only the dead.” *(Harold Rosenberg)*  
Discuss politics and art in the light of this quotation making reference to creativity and innovation in the arts through examples from Classical to Modern times.

“Id-differenzi bejn revoluzzjoni fl-arti u revoluzzjoni fil-politika huma enormi. Revoluzzjoni fl-arti ma tinstabx fir-rieda li teqred imma fir-revelazzjoni ta’ dak li digħi nqered. L-arti toqtol biss il-mejjet.” *(Harold Rosenberg)*

*Iddiskuti l-politika u l-arti fid-dawl ta’ din il-kwotazzjoni billi tagħmel referenza għall-kreattività u l-innovazzjoni fl-arti permezz ta’ eżempji miż-żminijiet Klassiċi sa dawk Moderni.*

**Or/Jew**

- 2** “We cannot think without language, we cannot process experience without story.”  
*(Christina Baldwin)*

Discuss this quotation in relation to the feelings and experiences resulting from narratives in the arts from Classical to Modern times. Pay particular attention to examples of stories containing a moral dimension.

*“Ma nistgħux naħsbu mingħajr lingwa, ma nistgħux nippōċċessaw esperjenza mingħajr storja.”* *(Christina Baldwin)*

*Iddiskuti din il-kwotazzjoni f’reħazzjoni mas-sentimenti u l-esperjenzi li jiġu min-narrattivi fl-arti taż-żminijiet Klassiċi sa dawk Moderni. Ikkonċentra partikularment fuq eżempji ta’ stejjer li fihom xeħta morali.*

**Section C/Taqṣima C****Either/Jew**

- 1** Consider the following two quotations:

“The history of Science is . . . a narrative of the conflict of two contending powers, the expansive force of the human intellect on one side, and the compression arising from traditional faith and human interests on the other.”

*(John W. Draper, History of the Conflict Religion, D. Appleton and Co., 1881)*

“. . . some historians had always regarded the Draper thesis as oversimplifying and distorting a complex relationship . . . Although popular images of controversy continue to exemplify the supposed hostility of Christianity to new scientific theories, studies have shown that Christianity has often nurtured and encouraged scientific endeavour . . . [instances as the] Galileo . . . trial . . . were the exceptions rather than the rule.”

*(Gary Ferngren (Ed.), Science and Religion: A Historical Introduction, Johns Hopkins University Press, 2002 – Introduction, p. ix)*  
 Discuss.

Aħseb fuq dawn iż-żewġ kwotazzjonijiet:

*“Il-ğrajja tax-Xjenza hija . . . narrattiva ta’ konfliett bejn żewġ poteri li jikkompetu ma’ xulxin, il-forza espansiva tal-intellett uman fuq naħha waħda, u r-restrizzjoni ġejja mill-fidi tradizzjonali u l-interessi umani fuq oħra.”*

*(John W. Draper, History of the Conflict Religion, D. Appleton and Co., 1881)*

“. . . xi storjografi dejjem qiesu t-teżi ta’ Draper bħala waħda li tissimplifika żżejjed u tgħawweġ relazzjoni kumplessa . . . Għalkemm xbihat populari ta’ kontroversja jibqgħu juru l-ostilità ipotetika tal-Kristjaneżmu għal teoriji xjentifici ġoddha, l-istudji juru li l-Kristjaneżmu spiss issapportja u inkura għixxa l-isforzi xjentifici . . . [każijiet bħall-]qorti . . . ta’ Galileo . . . kienu l-eċċeżżjonijiet aktar milli r-regola.”

*(Gary Ferngren (Ed.), Science and Religion: A Historical Introduction, Johns Hopkins University Press, 2002 – Introduzzjoni, p. ix)*  
*Iddiskuti.*

**Or/Jew**

- 2 The term ‘technology’ is very widely and commonly used. Some web dictionary definitions of the term are:

“The application of scientific knowledge for practical purposes, especially in industry; machinery and devices developed from scientific knowledge; the branch of knowledge dealing with engineering or applied sciences.”

(<http://www.oxforddictionaries.com/definition/english/technology?q=technology>)

“The application of science, especially to industrial or commercial objectives. The scientific method and material used to achieve a commercial or industrial objective.”

(<http://www.thefreedictionary.com/technology>)

Explain further, distinguishing between the terms ‘science’ and ‘technology’.

*It-terminu ‘teknologija’ hu użat kullimkien u b’mod komuni. Xi definizzjonijiet minn dizzjunarji tal-web għal dan it-terminu huma:*

*“L-applikazzjoni tal-għerf xjentifiku għal skopijiet prattici, specjalment fl-industrija; makkinarju u apparat žviluppati minn għerf xjentifiku; il-fergħa tal-għerf li tiddilja mal-inginerija jew ix-xjenzi applikati.”*

(<http://www.oxforddictionaries.com/definition/english/technology?q=technology>)

*“L-applikazzjoni tax-xjenza, specjalment għal oġgettivi industrijali jew kummerċjali. Il-materjal u l-metodu xjentifiku użati biex jinkiseb xi oġgettiv kummerċjali jew industrijali.”*

(<http://www.thefreedictionary.com/technology>)

*Spjega aktar, billi tiddistingwi bejn it-termini ‘xjenza’ u ‘teknoloġija’.*

## Section D/Taqṣima D

### Either/Jew

- 1 We often read articles and comments in the newspapers stating that the quality of our air is deteriorating.

- (a) If this is the case, what is causing this deterioration?  
 (b) How can the situation be controlled and improved?

*Spiss naqraw artikli u kummenti fil-gazzetti li jgħidu li l-kwalità tal-arja tagħna qed tiddeterjora.*

- (a) *Jekk dan huwa l-każ, x’qed jikkaġuna din id-deterjorazzjoni?*  
 (b) *Kif tista’ tkun ikkontrollata u mtejba s-sitwazzjoni?*

### Or/Jew

- 2 Seen as the guiding principle for long-term global development, sustainable development consists of three pillars: **economic** development, **social** development, and **environmental** protection. It basically means that whilst we still continue developing and growing, we do so by taking care not to overuse our resources and degrade our planet since we and future generations both need it.

Are the demands of sustainable development being respected? Explain.

*L-iżvilupp sostenibbli, meta narawh bħala principju li jiggwidana għal žvilupp globali fit-tul, jikkonsisti fi tliet pilastri: žvilupp **ekonomiku**, žvilupp **soċjali**, u ħarsien **ambjentali**. Bażikament dan ifisser li waqt li nibqgħu niżviluppaw u nikbru, nagħmlu hekk billi noqogħdu attenti li ma nużawx iżżejjed ir-riżorsi tagħna u ma nbaxxu l-pjaneta tagħna la darba kemm aħna u kemm l-ġenerazzjonijiet ta’ warajna neħtiġuha.*

*Id-domandi tal-iżvilupp sostenibbli qiegħdin jiġu rrispettati? Spjega.*