Manchester Metropolitan University

Faculty of Business and Law
Finance and Economics

Coursework Brief 2023-2024

Unit Name:	Quantitative modelling	
Unit Code:	5L7Z0016	For contact information
Unit Leader(s):	Wei Jin	please see Moodle

Submission Date: See date on Moodle	**Feedback Return Date:** See date on Moodle
Digital Submission Instructions: Please submit via the Moodle submission point for the unit	**Feedback Return Information**: Please see Moodle for the return date for feedback and marks

Key task and word count (or equivalent):

1. A 3,000 word (minimum) academic journal as described below
2. a separate clearly explained *Do file* of your statistical coding

Unit Learning Outcomes:
1. Effectively decide on the most appropriate techniques to employ
2. Effectively use the most appropriate estimator(s)
3. Critically analyse the results of the estimator(s) and how they relate to the research question.

This assessment will contribute to the achievement of the following Programme Learning Outcomes (PLOs):

In this unit you will be introduced to the **professional skills** below and their measurement is embedded within the rubric, rather than set out as a separate section for you to achieve.

PLO 1: Our postgraduates will apply critical thinking to the analysis of situations, draw appropriate conclusions and make recommendations for action
1.1   Identify, acquire and analyse data and information to evaluate its relevance and validity
1.1.1   Identify data appropriate to the topic area
1.1.2   Select and apply analytical tools appropriate to theoretical perspective (s)

1.2   Synthesise and apply a range of information to generate a business outcome
1.2.1   Application of concepts, principles or theories to the context
1.2.2   Conclusions drawn with consideration of impact

PLO 5: Our postgraduates will develop advanced subject specific knowledge, professional and research skills in Economic and Financial Analysis

5.1 Demonstrate critical understanding of Economic and Financial Analysis
5.1.1   Act independently in order to construct a research question

5.2   Conduct research in the subject area
5.2.1   Identify literature relevant to the chosen research topic
5.2.2   Critically analyse literature relevant to chosen research topic

Assignment Details and Instructions

Task: Prepare an academic journal style research article using the LIS dataset (details below) to analyse inequality. **Specifically:**

Within countries (but not necessarily across) the gap between rich and poor has widened in recent decades.

   • **Use the data provided to analyse whether and to what extent taxes and social transfers have contributed/counteracted this trend.**

   • **Has the redistributive power of different social programmes changed over time?**

   • **Do we observe anywhere the "paradox of redistribution"?**

   • **Alternative objective – discussed *beforehand* with the unit leader**

NB: The paradox of redistribution is when the greater a social transfer is targeted at the poor the less likely it is to reduce poverty and inequality, as discussed by Korpi and Palme (1998). This is a highly debated conclusion, see for example, Marx I *et. al.* (2013). It is dependent on both country and period as well as the institutional framework/ policy mix in which a transfer is implemented. That said more sophisticated analytical work, which is a panel rather than cross sectional finds supporting evidence for the paradox.

You are required to choose a set of countries, periods and/or transfers and taxes from the dataset, which provides an overall analysis, to evaluate both the size and progressiveness of a social transfer (pension, unemployment benefit, wage supplement etc.) and the "target efficiency" of a transfer or tax instrument. The supporting paper defines methods and terms, if in a rather uncritical manner.

From the whole period and range of countries, you need to choose a **justified** set and analyse the above questions. Factors which can shape your justified choice of subset and technique:

- Countries
- Regions
- Years – as consistent selection of waves so as to employ panel data methods
- Working age or whole population or children or elderly
- Types of transfers and taxes,
- Look at the balance of taxes and transfers in addressing initial primary inequality
- Is the relative level of primary inequality relevant?
- Pool as one country or treat countries individually (as a panel)
- Needs clear descriptive statistics & graphs to show patterns over times & regions
- You need a big enough sample – the smaller the sample the less likely you can identify any effect.

Resources:

To support your papers, I have provided you with the datasets and supporting papers, which describe their construction definition, on the Moodle site. However, you can also access these and further supporting information via the LIS and Leiden university webpages – please see the bibliography for the links.

The datasets and papers are:

1. LIS assignment Dataset 2019

(Excel format – needs importing to Stata)

2. LIS working paper 2019 Discussion

(Support paper discussing the concepts, usage and application of the

dataset, extended examples and debate of the issues + possible

information sources)

3. LIS 2019 Dataset Definition

Support paper with detail on terms and variable construction

The dataset was created for specific projects using Luxemburg Income Survey (LIS) Data and are available in their resources area, extra datasets on their webpage. *"LIS acquires*

datasets with income, wealth, employment, and demographic data from many high- and middle-income countries, harmonises them to enable cross-national comparisons, and makes them publicly available in two databases, the Luxembourg Income Study Database (LIS) and the Luxembourg Wealth Study Database (LWS)" (www.lisdatacentre.org, no date).

Formatting and Structure:

Your output needs to be in the form of an academic paper, such as those you find in academic journals. This means you will need to read journal articles widely to understand the general requirements – you may even adopt the style of a leading journal.

Please keep your topic narrow and simple. Otherwise, you will over complicate your task.

Please format your work following these guidelines

1. Clear title (less than 12 words)

2. 100 word abstract

3. Key words and three JEL codes

4. Brief Introduction

5. Mini **Critical** Literature Review

6. Dataset – explain why useful

7. Methodology (justify statistical analysis and how links to the dataset)

8. Full discussion of the findings in terms of the literature review

9. Times Roman or Calibri 12pt font, 1.5 spacing, justified on the both left and right,

10. Well-crafted paragraphs which focus on one issue at a time and do not over extend

11. All graphs and tables need a clear title at the top and numbering, notes, source and author information at the bottom. They should not "bleed" across pages

12. Use the sophisticated output/production facilities of the statistical programme to produce work which approximates professional outputs. *Hurried copying and pasting of output throughout the work will be insufficient.*

13. Identify the short comings of outputs and possible remedies

14. Go beyond the minimum required

15. For a high grade you need to provide a sophisticated understanding of methods outputs and the question at hand

15. Bibliography (not included in word count, Harvard Referencing)

16. Appendix, some output and tests of regressions if required (not in the word count, but do not abuse!)

Assessment Criteria (final page) – *Please note the final mark is holistic and based on the overall quality of the article, the below is a guideline only*

This coursework will be marked using **step marking**.
The word count is a guide, not a target. However, excessively short essays (less than 1,500 words) or excessive length (more than 3,500 words) will be penalised at the rate of a reduction of one step (on the step marking scheme) for every 10% outside these limits.

The word limit does not apply to computer output, tables, appendices, footnotes or the references section. You should, however, only include computer output, tables, appendices and footnotes which are of relevance to the report.

Support: We will provide detailed guidance on how to approach and structure your report. Additionally, students are encouraged to attend designated student hours for one-on-one essay discussions, or they can reach out to the unit leader via email to arrange alternative meeting times.

Bibliography

Dataset Wang J. & Caminada K. (2019) Leiden LIS Budget Incidence Fiscal Redistribution Dataset on INCOME INEQUALITY for 49 LIS countries - 1967-2016, version 1, February 2019,

Downloaded November 2019 from;

http://www.lisdatacenter.org/resources/other-databases/

Caminada K., Wang J., Goudswaard K. and Wang C. (2019), Relative income poverty rates and poverty alleviation via tax/benefit systems in 49 LIS-countries, 1967-2016 Luxemburg Income survey Working paper No. 761 February 2019 accessed 1st November from: https://www.lisdatacenter.org/resources/other-databases/

Garcia-Fuente, X., (2021) : The paradox of redistribution in time: Social spending in 53 countries, 1967-2018, LIS Working Paper Series, No. 815, Luxembourg Income Study (LIS), Luxembourg

available at: http://hdl.handle.net/10419/247249

Gugushvilia D., and Laenena T (2021) Two decades after Korpi and Palme's "paradox of redistribution": What have we learned so far and where do we take it from here? | Journal of International and Comparative Social Policy | Cambridge Core

Journal of International and Comparative Social Policy (2021), 37: 2, 112–127

doi:10.1017/ics.2020.24

Marx I., Salanauskaite L. and Verbist G.,(2013) The paradox of redistribution revisited: and that it may rest in peace? GINI Discussion Paper 82, August 2013 accessed September 2018 at: http://gini

research.org/system/uploads/583/original/82.pdf?1385131289

Korpi W & Palme J (1998), The Paradox of Redistribution and Strategies of Equality: Welfare State Institutions, Inequality, and Poverty in the Western Countries, American Sociological Review 63: 661-687

Academic Integrity, Academic Misconduct and Plagiarism

Academic Integrity is about engaging in good academic practice. It means being honest and transparent, and demonstrating rigour and accuracy in your work. This can include the proper citation and referencing of the sources of your ideas and information, ensuring that you are using appropriate research methods, or checking that your work is free of errors.

Additional information, video tutorials and guides to support good academic practice and maintain Academic Integrity in your assignments can be found on the Academic Integrity area of the **Academic and Study Skills page on Moodle**.

Academic Misconduct is any action that could give you an unfair advantage in coursework, exams, or any other assessed work, which could lead to undermining the academic standards of the University. This includes practices such as plagiarism, self-plagiarism, collusion, contract cheating or falsification of data. Full details of the Manchester Metropolitan University guidelines for Academic Misconduct and definitions of terms can be found **here**.

All work submitted must be students' own work. Students may not consult with other people in preparing this coursework. This coursework will be submitted through Moodle and, as with all coursework and online exams, will be routinely assessed for originality using TurnItIn.

University Stepped Marking Guidelines

Please note stepped marking is applied as below:

Mark	PGT Classification
95 - 100%	Distinction
90%	
85%	
80%	
75%	
72%	
68%	Merit
65%	
62%	
58%	Pass
55%	
52%	
48%	Fail
45%	
42%	
38%	
35%	
32%	
28%	
25%	
22%	
18%	
15%	
12%	
8%	
5%	
2%	
0%	
	Non submission

Assessment Marking Rubric

In marking this assessment, the marking rubric below will be applied, and all aspects of the unit learning outcomes and Programme Learning Outcomes (PLOs) will be eviden

Weighting		0-29%	30-39%	40-49%	50-59%	60-69%	70%-80%	80%+	PLO	Weight %
Assessment Description	**What did we look at?**									
Assessment Description 1	**Critical selection and analysis of the relevant underlying literature and theory to frame the data and conclusions**	No selection of relevant literature and theory, which frames data work and conclusions	Some selection of relevant literature and theory, which frames data work and conclusions.	Adequate selection of relevant literature and theory, which frames data work and conclusions	Satisfactory selection of relevant literature and theory, which frames data work and conclusions.	Good selection of relevant literature and theory, which frames data work and conclusions.	Rigorous selection of relevant literature and theory, which frames data work and conclusions	oustandingselection of relevant literature and theory, which frames data work and conclusions	**PLO 5.1. and 5.2**	
Assessment Description 2	**Identify, acquire and analyse data and decide on the most appropriate techniques to employ (objective 1)**	No attempt to incorporate data	Some data usage but inappropriate or wrong	Adequate data usage	Satisfactory data manipulation and usage	Good critical use of data to generate good evidence	Rigorous use of data to produce excellent evidence	Authoritative and exemplary use of data and production of evidence	**PLO 1.1**	

Assessment Description 3	**Effectively use the most appropriate estimator(s) (objective 2)**	No demonstration of appropriate technical skills	Some demonstration of appropriate technical skills	Adequate demonstration of appropriate technical skills	Sufficient demonstration of appropriate technical skills	A fluent demonstration of appropriate technical skills	An Original demonstration of appropriate technical skills	An insightful demonstration of appropriate technical skills		
Assessment Description 4	**Critically analyse the results of the estimator(s) and how they relate to the research question (objective 3)**	No analysis	Some critical analysis	Adequate critical analysis	Sufficient critical analysis	Fluent critical analysis	Original critical analysis	Insightful critical analysis	**PLO 1.2**	

Assessment Description 5	**Conclusions are evidence based and supported through critical discussion**	No conclusions evident	Some conclusions drawn but are more opinionated than evidence based	Adequate conclusions drawn from discussion	Satisfactory conclusions drawn from discussion	Appropriate and critical conclusions drawn	Reflective conclusions drawn from discussion	Illuminating and insightful conclusions drawn	**PLO 1.2**
Assessment Description 6	**Essay is well structured, logical and organised**	Unstructured, illogical flow, disorganised	Some structure and logical flow, but still too jumbled	Adequate structure and flow, acceptable organisation	Satisfactory structure and organisation. Coherent and logical flow	Good structure and organisation. Critical flow and connectivity between elements	Excellent structure and organisation. Fluent and precise connectivity between elements	Outstanding structure and organisation. Authoritative connectivity between elements	

Assessment Description 7	**Appropriate academic language, spelling, grammar syntax**	Inappropriate language and syntax unacceptable grammar and spelling	Poor use of academic language, too many spelling errors, bad grammar	Acceptable, language, grammar and syntax. Still needs to be more academic	Satisfactory use of academic language. Appropriate syntax, few spelling or grammatical errors	Good use of academic language. Precise syntax. No grammatical or spelling errors	Excellent use of academic language, sophisticated syntax. Excellent spelling and grammar	Complex language and syntax. Outstanding grammar		
Assessment Description 8	**Consistent and appropriate referencing and in text citation**	No referencing apparent	Some references and in text citation. Not in the Harvard style or inconsistently applied	Adequate Harvard referencing, but still some inconsistences, some inappropriate sources. Adequate in text citations	Satisfactory Harvard referencing, Sufficient in text citations, more needed.	Thorough and sufficient referencing. Precise in text citations	Sophisticated referencing and in text citations	Authoritative referencing and in text citations		

Weighting Total	100.00%