

# Examiners' Report: Final Honour School of Mathematics & Philosophy Part B Trinity Term 2023

October 26, 2023

## Part I

### A. Statistics

- **Numbers and percentages in each class.**

See Table 1, page 1.

Table 1: Numbers in each class

	Number					Percentages %				
	2023	(2022)	(2021)	(2020)	(2019)	2023	(2022)	(2021)	(2020)	(2019)
I	10	(6)	(6)	(8)	(4)	55.56	(37.5)	(42.86)	(50)	(30.77)
II.1	5	(8)	(9)	(5)	(8)	27.78	(50)	(57.14)	(31.25)	(61.54)
II.2	3	(2)	(0)	(3)	(1)	16.67	(12.5)	(0)	(18.75)	(7.69)
III	0	(0)	(0)	(0)	(0)	0	(0)	(0)	(0)	(0)
P	0	(0)	(0)	(0)	(0)	0	(0)	(0)	(0)	(0)
F	0	(0)	(0)	(0)	(0)	0	(0)	(0)	(0)	(0)
Total	18	(16)	(15)	(16)	(13)	100	(100)	(100)	(100)	(100)

- **Numbers of vivas and effects of vivas on classes of result.**

Not applicable.

- **Marking of scripts.**

All Philosophy scripts, essays and theses are double-marked, after which the two markers consult in order to agree a mark between them. If the two markers are unable after discussion to agree a mark, the mark is decided by a third marker, within the range of the two initial marks. All Mathematics scripts were, as is the normal practice, single-marked according to carefully checked model solutions and a pre-defined marking scheme closely adhered to. A comprehensive independent checking procedure is also followed. (See the Mathematics Part B report for details). BEE extended essays and coursework for BO1.1 History of Mathematics were double-marked.

## **B. Strike Action**

The marking of Part B Mathematics examinations was not affected by the marking and assessment boycott (MAB). However, several Philosophy examinations were affected. The Department of Philosophy sought, and obtained permission from Education Committee to use single-marking with moderation in such cases. The paper moderators looked at scripts for all “lone” markers, being sure to cover (1) borderline marks, eg 49, 59, 69 (2) any fails (3) a random sample of 10-20% of the remaining scripts. The Department also moderated all single-marked Philosophy theses.

## **C. Changes in examining methods and procedures currently under discussion or contemplated for the future**

None.

## **D. Notice of examination conventions for candidates**

The first Notice to Candidates was issued on 15 March 2023 and the second notice on 28 April 2023.

All notices and the examination conventions for 2023 are online at <http://www.maths.ox.ac.uk/members/students/undergraduate-courses/examinations-assessments>.

## Part II

### A. General Comments on the Examination

The examiners would like to record their heartfelt thanks to all those who helped in the preparation, administering, and assessing of this year’s examinations. The chair would like to thank Haleigh Bellamy, Clare Sheppard, Charlotte Turner-Smith, Waldemar Schlackow, Matt Brechin and the rest of the academic administration team for their support of the Part B examinations.

The internal examiners are grateful to the external examiner Prof. John Hunton (Mathematics) for generously performing their special role in this process.

### B. Equality and Diversity issues and breakdown of the results by gender

Table 2, page 3 shows percentages of male and female candidates for each class of the degree. The number of candidates is small enough that it would not be meaningful to examine the variation in the performance of men and women in this cohort.

Table 2: Breakdown of results by gender

Class	Number								
	2023			2022			2021		
	Female	Male	Total	Female	Male	Total	Female	Male	Total
I	1	9	10	0	1	1	6	2	8
II.1	0	5	5	3	4	7	5	4	9
II.2	2	1	3	2	0	2	0	1	1
III	0	0	0	0	0	0	0	0	0
P	0	0	0	0	0	0	0	0	0
<b>Total</b>	<b>3</b>	<b>15</b>	<b>18</b>	<b>5</b>	<b>5</b>	<b>10</b>	<b>11</b>	<b>7</b>	<b>18</b>

  

Class	Percentage								
	2023			2022			2021		
	Female	Male	Total	Female	Male	Total	Female	Male	Total
I	33.33	60	55.56	0	20	10	54.54	28.57	44.44
II.1	0	33.33	27.78	60	80	70	45.45	57.14	50
II.2	66.67	6.67	16.67	40	0	20	0	14.29	5.56
III	0	0	0	0	0	0	0	0	0
P	0	0	0	0	0	0	0	0	0
<b>Total</b>	<b>100</b>								

### C. Detailed numbers on candidates’ performance in each part of the exam

See Table 3, page 4 for the number of candidates taking each Mathematics paper, together with statistics for the raw marks (average and standard deviation), and USMs (average and

standard deviation) attained on each paper by this cohort. It should be noted that the total raw marks for a unit are 50 whilst the USMs are scaled to a maximum of 100. In accordance with University guidelines, statistics are not given for papers where the number of candidates was five or fewer.

Table 3: Statistics by paper (Mathematics papers)

Paper	Number of Candidates	AvgRaw	StdevRaw	Avg USM	StdevUSM
B1.1	18	39	10.81	71.18	17.13
B1.2	18	35.88	10.15	67.59	13.39
B3.1	6	30.4	9.4	67.2	8.67
B3.5	7	29.17	11.09	61.33	12.8
B8.5	9	28.11	12.06	57.11	15.53

See Table 4, page 4 for the number of candidates taking each Philosophy paper, together with statistics for the USMs (average and standard deviation) attained on each paper by this cohort. In accordance with University guidelines, statistics are not given for papers where the number of candidates was five or fewer.

Table 4: Statistics by paper (Philosophy papers)

Paper	Number of Candidates	Avg USM	StDev USM
102 Knowledge and Reality	13	65.68	9.39
122 Philosophy of Mathematics	18	64.41	5.14
127 Philosophical Logic	11	71.80	8.46

## **D: Comments on papers and individual questions**

See reports from Mathematics Examiners and from Philosophy Examiners.

## **E. Names of members of the Board of Examiners**

Prof. Damian Rössler (Chair)

Prof. Jochen Koenigsmann

Prof. Kevin McGerty

Dr Alexander Paseau

Prof. Peter Millican

Prof. John Hunton (external)