

**Higher Specialist Diploma - Portfolio Essay Titles for Submission in 2026**

**Regulations**

Two essays must be included in the portfolio as evidence of experiential learning. If, when you applied to undertake the HSD, you indicated you wanted to submit in 2026 you must choose any two essay titles from either the 2025 or 2026 list of essay titles. Both essays could come from the 2025 list or from the 2026 list or you can do one essay from each list. If you had initially aimed to submit in 2025 but have had to defer one essay title can come from the 2024 list but the other essay must come from either the 2025 or 2026 list.

Essays should be 3000 words (±10%). Figures, tables and their respective legends and the reference list are **not** included in the word count of the essay. Candidates must use appropriate material from various sources within both essays, and these must be referenced in either the Harvard **or** Vancouver format. Guidance on how to reference in either format can be found on the IBMS website [here](https://www.ibms.org/resource-hub/resource-search.html?searchQuery=referencing) by typing the word ‘referencing’ into the search bar.

More information on writing these essays can be found in the article that appeared in the January 2024 edition of the Biomedical Scientist on ‘Writing at the Right Level’ which can be found [here](https://thebiomedicalscientist.net/2024/01/05/writing-right-level). In addition, a Support Hub session was held on this topic in March 2024 hosted by the IBMS Head of Examinations (Mr Chris Ward) and Head of Digital Education (Dr Jim Taylor). The recording of this session can be found on our website [here](https://www.ibms.org/resource/writing-at-the-right-level.html).

Candidates should note that the essays will be entered into the originality checking software system called Turnitin. This software produces a report that highlights not only how much text is similar to other sources but also where this material is located.

The similarity score that is produced as part of its Turnitin report requires the academic judgement of the examiners and the IBMS Head of Examinations to interpret whether this necessitates any action. Where plagiarism is detected, or if the similarity score is unacceptably high, it will be treated as academic malpractice and may have serious consequences. This could include the failure of the portfolio.

**Important Points to Remember**

The completion of the two essays forms parts of the portfolio requirements for the HSD. These essays help candidates to demonstrate to the examiners that they have a comprehensive understanding of a specific field of biomedical science and knowledge and understanding of current issues and developments which are key learning outcomes of the HSD. At this level, you should be able to demonstrate:

* a systematic understanding of knowledge and a critical awareness of current problems, much of which is at, or informed by, work at the forefront of the academic discipline
* a comprehensive understanding of techniques applicable to their own research
* originality in the application of knowledge
* a conceptual understanding that enables critical evaluation of current research in their discipline

In constructing your essays you should:

* critically evaluate/discuss
* judge the relevance and significance of information
* evaluate claims, inferences, arguments and explanations
* construct clear and coherent arguments
* form well-reasoned judgements and decisions
* integrate and appraise reading and research
* be original in your application of knowledge

**HSD Essay Titles for 2026**

**Cellular Pathology**

Critically discuss the value of artificial intelligence and digital pathology within a modern day cellular pathology laboratory service.

Critically discuss the range and scope of techniques employed in the evaluation of hard tissues within Cellular Pathology.

**Clinical Chemistry**

The Prostate Specific Antigen (PSA) is the primary method for screening for prostate cancer. Critically discuss why there isn’t an established screening programme for this type of cancer.

Critically evaluate the potential of salivary biomarkers in the early diagnosis and monitoring of Alzheimer's disease.

**Cytopathology**

Compare and contrast the Paris System (TPS) diagnostic categories with previous urine cytology reporting systems, highlighting their clinical utility and limitations.

The World Health Organisation (WHO) cervical cancer elimination strategy states that to eliminate cervical cancer, all countries must reach and maintain an incidence rate of below 4 per 100,000 women. Achieving that goal rests on three key pillars and their corresponding targets:

* vaccination: 90% of girls fully vaccinated with the HPV vaccine by the age of 15;
* screening: 70% of women screened using a high-performance test by the age of 35, and again by the age of 45;
* treatment: 90% of women with pre-cancer treated and 90% of women with invasive cancer managed.

Critically discuss the challenges the UK screening programmes face on meeting these targets..

**Haematology**

Discuss antibodies against platelet factor 4, with critical appraisal of the associated pathologies and methods of detection.

Critically discuss the potential role of circulating tumour DNA (ctDNA) in the investigation of haematological malignancies and evaluate the potential implications for haematology laboratory practice following its adoption in lung and breast cancer diagnostics

**Immunology**

Discuss the pathophysiology of PANDAS (Paediatric Autoimmune Neuropsychiatric Disorders Associated with Streptococcal Infections) and the role the immunology laboratory plays in the diagnostic pathway.

The Royal College of Pathologists (RCPath) has recently published new guidelines for the use of laboratory allergy testing in primary care (G194). Discuss the challenges of adopting these into your laboratory and the role of component resolved diagnostics (CRD) in allergy testing.

**Leadership and Management**

Discuss the views that the future style of pathology working will be largely determined by increasing automation and that technology is taking science out of Biomedical Science.

Critically review options for assessing the efficiency, effectiveness and performance of a department on an on-going basis and discuss options for increasing efficiency going forwards. Justify your choices.

**Medical Microbiology**

Critically discuss *Lactobacillus delbrueckii* as a potential emerging uropathogen

Critically analyse the application of metagenomic analysis within Microbiology, and how it compares to other established methods*.*

**Transfusion Science**

Following the publication of the Infected Blood Inquiry reporting in May 2024, critically discuss recommendation 7 (a-f) and how it aims to support the workforce and benefit patients.

Critically discuss the structural and functional diversity of clinically significant red blood cell antigens.

**Virology**

Discuss the challenges and strategies in the laboratory diagnosis of novel influenza strains in the UK, considering the co-circulation of multiple influenza A subtypes, the role of your laboratory and reference testing.

Critically evaluate the implementation and impact of opt-out HIV testing in accident and emergency departments. Discuss the challenges in achieving widespread adoption and the implications for laboratory testing and diagnostics.