

# NATS 1003 DIGITAL FORENSIC PHOTOGRAPHY

**Credit Points** 10

**Legacy Code** 300874

**Coordinator** Robert Ebeyan ([https://directory.westernsydney.edu.au/search/name/Robert Ebeyan/](https://directory.westernsydney.edu.au/search/name/Robert%20Ebeyan/))

**Description** Forensic photography serves an important function within forensic science for the purpose of scene and item documentation, as well as the detection and enhancement of forensic evidence. This unit introduces the student to the fundamental principles and practices of forensic photography. Topics include: principles of light science, digital imaging, camera and lighting operations, technical photography composition, and the maintenance of image integrity.

**School** Science

**Discipline** Forensic Science

**Student Contribution Band** HECS Band 2 10cp

Check your HECS Band contribution amount via the Fees ([https://www.westernsydney.edu.au/currentstudents/current\\_students/fees/](https://www.westernsydney.edu.au/currentstudents/current_students/fees/)) page.

**Level** Undergraduate Level 1 subject

**Pre-requisite(s)** NATS 1008

**Equivalent Subjects** NATS 2012 - Digital Forensic Photography 1

**Restrictions** Students must be enrolled in 3589 Bachelor of Science (Forensic Science), 3562 Bachelor of Science (Advanced Science) (Forensic Science) or MT3022 Forensic Science

## Learning Outcomes

On successful completion of this subject, students should be able to:

1. Investigate the conceptual relationship between the collection of images, their optical enhancement and the production of physical evidence
2. Evaluate how the reliability of photographic evidence may be considered in the context of an Australian legal framework
3. Relate theoretical principles of the behaviour of light and image formation to photographic optics and image analysis
4. Evaluate the utility and interpretation of imaging science principles in the context of forensic evidence
5. Describe concepts of light propagation, colour temperature, wavelength and spectral distribution of light and its collection as digital images
6. Utilise digital imaging methods and theory for the extraction of forensic evidence
7. Analyse two and three dimensional images in terms of the veracity and fidelity as forensic evidence
8. Discuss the validity of photographic evidence as a means of forensic examination

## Subject Content

1. Forensic photography principles and practices
2. Digital SLR camera functions and operations, photographic lenses and image perspective
3. Understanding digital imaging and image processing

4. Light and photographic science principles, exposure, white balance and colour space
5. Maintaining forensic digital image integrity
6. Lighting and technical composition for forensic photography

## Assessment

The following table summarises the standard assessment tasks for this subject. Please note this is a guide only. Assessment tasks are regularly updated, where there is a difference your Learning Guide takes precedence.

Item	Length	Percent	Threshold	Individual/Group Task
Quizzes	3x quizzes (30 minutes each)	30	N	Individual
Practical Folio	Exercises during prac sessions	30	N	Individual
Practical Exam	4 hours	40	N	Individual

Prescribed Texts

- Robinson, E., & ScienceDirect. (2016). Crime scene photography (3rd ed.)

Teaching Periods

## Spring Hawkesbury Day

**Subject Contact** Robert Ebeyan ([https://directory.westernsydney.edu.au/search/name/Robert Ebeyan/](https://directory.westernsydney.edu.au/search/name/Robert%20Ebeyan/))

View timetable ([https://classregistration.westernsydney.edu.au/even/timetable/?subject\\_code=NATS1003\\_22-SPR\\_HW\\_D#subjects](https://classregistration.westernsydney.edu.au/even/timetable/?subject_code=NATS1003_22-SPR_HW_D#subjects))