



National Unit specification: general information

Unit title: Digital Photography: Image Manipulation and Print
(SCQF level 6)

Unit code: FR2G 12

Superclass: CB

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Summary

This Unit is designed to enable candidates to manipulate digital image files and prepare them for a variety of final output options. It will also provide candidates with opportunities to develop good practice in producing their own original and well-planned images.

This is a mandatory Unit in the National Certificate in Photography at SCQF level 6 but can also be taken as a freestanding Unit. It provides suitable preparation for candidates wishing to undertake further study in photography.

Outcomes

- 1 Research digital file preparation for output and digital output devices.
- 2 Plan a series of photographs for a digital portfolio to a given brief.
- 3 Manipulate selected digital image files appropriately in relation to the planned outcome.
- 4 Prepare and output enhanced digital image files.
- 5 Evaluate finished images.

Recommended entry

While entry is at the discretion of the centre, candidates would normally be expected to have attained one of the following, or equivalent:

Photography: Basic Camera Techniques (SCQF level 6) and

Photography: Basic File Optimisation (SCQF level 6)

or

Photography: Workflow and Creative Manipulation (SCQF level 6)

National Unit specification: general information (cont)

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Credit points and level

1 National Unit credit(s) at SCQF level 6: (6 SCQF credit points at SCQF level 6*)

**SCQF credit points are used to allocate credit to qualifications in the Scottish Credit and Qualifications Framework (SCQF). Each qualification in the Framework is allocated a number of SCQF credit points at an SCQF level. There are 12 SCQF levels, ranging from Access 1 to Doctorates.*

Core Skills

Achievement of this Course gives automatic certification of the following:

Complete Core Skill Problem Solving at SCQF level 6

Core Skill component None

There are also opportunities to develop aspects of Core Skills which are highlighted in the Support Notes of the Unit Specifications for this Course.

National Unit specification: statement of standards

Unit title: Digital Photography: Image Manipulation and Print
(SCQF level 6)

Acceptable performance in this Unit will be the satisfactory achievement of the standards set out in this part of the Unit specification. All sections of the statement of standards are mandatory and cannot be altered without reference to SQA.

Outcome 1

Research digital file preparation for output and digital output devices.

Performance Criteria

- (a) Correctly describe colour spaces and their purpose when considering print layout.
- (b) Accurately identify and describe the uses of colour profiles.
- (c) Research and identify characteristics of a range of print material types.
- (d) Research and compare a range of output hardware devices.

Outcome 2

Plan a series of photographs for a digital portfolio to a given brief.

Performance Criteria

- (a) Use relevant information to produce a plan of action.
- (b) Identify appropriate techniques to be used.
- (c) Select images that are visually and technically appropriate to the manipulation techniques selected.
- (d) Identify print output materials and processes that are visually and technically appropriate to selected image files.

Outcome 3

Manipulate selected digital image files appropriately in relation to the planned outcome.

Performance Criteria

- (a) Retrieve, evaluate and name appropriate files.
- (b) Manipulate selected image files as appropriate to the planned outcome.

National Unit specification: statement of standards (cont)

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Outcome 4

Prepare and output enhanced digital image files.

Performance Criteria

- (a) Prepare enhanced digital image files in a layout format appropriate to the planned outcome.
- (b) Size enhanced digital image files as appropriate to the planned outcome.
- (c) Select resolution, colour profile and colour space appropriate to the chosen output method.
- (d) Output image files in a format appropriate to the planned outcome.

Outcome 5

Evaluate finished images.

Performance Criteria

- (a) Evaluate the selection of images in relation to the brief.
- (b) Evaluate the enhancement of the image files in relation to the brief.
- (c) Evaluate the effectiveness of the selected output methods used in relation to the planned outcome.

Evidence Requirements for this Unit

Evidence is required to demonstrate that all Outcomes and Performance criteria have been achieved.

Written and/or oral recorded evidence, performance and product evidence is required. This material will be produced under open-book conditions.

Outcome 1

Written and/or oral recorded evidence is required to show that the candidate can:

- ◆ provide accurate descriptions of a minimum of two 'colour space' models
- ◆ provide accurate descriptions of the impact of a minimum of two colour profiles
- ◆ describe and compare characteristics of a minimum of two print output materials
- ◆ describe and compare characteristics of a minimum of two print devices/ services

National Unit specification: statement of standards (cont)

Unit title: Digital Photography: Image Manipulation and Print (SCQF level 6)

Outcome 2

Written and/or oral recorded evidence is required to show that the candidate can:

- ◆ produce a plan based upon:
 - review and evaluation of their own current image catalogue against the requirements of the brief
 - review and evaluation of the visual impact of image enhancement/manipulation techniques on their images against the requirements of the brief
 - review and evaluation of the visual impact of a minimum of two print output materials and devices
- ◆ describe how a range of images are to be originated which will be appropriate for their chosen output and enhancement techniques

Outcome 3

Product and performance evidence is required to show that the candidate can:

- ◆ enhance /manipulate images using: adjustment layers; fill layer; vector text; graphics; layers style (mode); layer mask; filters; extending dynamic range; for a minimum of six digital images. Each technique should be used at least once
- ◆ use selection tools appropriately; localised tonal control; sharpening; creating a border; print layout; for a minimum of six digital images. Each technique should be used at least once
- ◆ produce a minimum of six images appropriate to outcome planned in Outcome 2

Outcome 4

Product and performance evidence is required to demonstrate that candidates can:

- ◆ resize images and select the correct resolution for print
- ◆ prepare files for print — colour space/ print profiles
- ◆ choose output materials which complement the planned outcome
- ◆ choose output devices which complement the planned outcome
- ◆ output a minimum of six printed images correctly, minimum size A4, maximum size A3

Outcome 5

Written and /or oral recorded evidence is required which must include:

- ◆ a summary of the effectiveness of the image selection in a minimum of 200 words
- ◆ an evaluation of the effectiveness of image enhancement techniques used in relation to the brief in a minimum of 200 words
- ◆ an evaluation of the appropriateness and impact of the final printed output which reflects peer, self and tutor feedback in a minimum of 200 words

National Unit specification: support notes

Unit title: Digital Photography: Image Manipulation and Print
(SCQF level 6)

This part of the Unit specification is offered as guidance. The support notes are not mandatory.

While the exact time allocated to this Unit is at the discretion of the centre, the notional design length is 40 hours.

Guidance on the content and context for this Unit

The context for this Unit is in the provision of opportunities for candidates to review their own images, image manipulation techniques and to carry out research into further opportunities to maximise the visual impact of their images in printed format.

Candidates will also have opportunities to develop the softer skills of *Critical Thinking*, *Problem Solving* and interpersonal skills especially where discussion and critique of the visual impact of techniques and processes take place as part of any learning and teaching approach.

In Outcome 1 it is recommended that candidates become familiar with the steps and techniques required to create print files that will reproduce adequately in a variety of print out-put processes. It is recommended that third party service providers be researched as well as those printing facilities available within centres.

Outcome 2 provides candidates with the opportunity to review their current image catalogue and generate a plan of action that will provide them with specific opportunities to improve images using techniques researched in Outcome 1 and to select print output types that will enhance the visual impact of final printed output produced in Outcome 4.

A review of candidates' existing images will inform decisions upon whether further images need be generated.

In Outcome 3 image files selected/ generated and collated within Outcome 2 would be visually enhanced using a variety of techniques, pre-planned to achieve an agreed outcome. The work in this Outcome is principally intended as opportunity for candidates to use the time allocated to increase the visual impact of their images through retouching and creative enhancement

In Outcome 4 it is suggested that candidates prepare enhanced finished image files for effective print production and presentation. Consideration of layout, paper stock and output device should be part of this preparation. Comparison of layout options and test prints exploring a variety of substrates are advised.

The context for Outcome 5 is a review of both planning and practical steps undertaken by the candidate. A successful review would provide accurate written reflections upon how effective or appropriate the selection and production of image files was and how these were enhanced by digital manipulation. It would also discuss the influence print methods and layout had on the impact of the images presented.

National Unit specification: support notes (cont)

Unit title: Digital Photography: Image Manipulation and Print
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Knowledge and understanding developed in this Unit aligns to aspects of the National Occupational Standards for Photo Imaging and for Journalism (Skillset). In particular this Unit deals with elements of the knowledge and skills outlined in:

- ◆ PI-16 Undertake technical adjustment of images
- ◆ PI-17 Prepare image output
- ◆ J 26 Manage Digital Images

Guidance on learning and teaching approaches for this Unit

This Unit offers opportunities for direct integration with other Units of study and in particular with Photography: Portfolio Production. This will assist in reducing assessment burden and will allow candidates to research output techniques and image file preparation for output. Where this Unit is delivered as part of the National Certificate in Photography (SCQF level 6) it is recommended that delivery should be in the latter stages of the NC to allow candidates to generate a sufficiently varied catalogue of images for review and preparation.

Outcome 1 (*Suggested 15% nominal delivery*)

Candidates should be given the opportunity to gather research information independently and should be directed to relevant websites and other resources that will inform them of a range of print production processes and services. It is advised that tutors should provide a context for candidates through provision of exemplars of different paper types and discussion of how appropriate varying tonal ranges can be achieved by a variety of paper finish. Discussion of the merits and visual effect of a variety of print would provide a useful starting point for candidate research.

Test prints and experimentation with differing combinations of manipulation and output in relation to specific image characteristics and tonality would allow candidates to make informed choices about final image manipulation and output of their images and is strongly recommended.

Outcome 2 (*Suggested 20% nominal delivery*)

It is recommended that candidates should be set a brief that allows them to review their existing images and identify areas of strength or opportunities for improvement in their practice. This knowledge should form the basis of a self-directed project producing images within the genres identified. Both existing and newly generated images could then be used as models for enhancement and print preparation in the following Outcomes within this Unit.

Outcome 3 (*Suggested 30% nominal delivery*)

It is suggested that the techniques used in enhancing image files should reflect a candidate's individual approach, however tutors must moderate the extent of enhancements to techniques appropriate to current practice and clearly identified within the candidate brief.

Tutors could assist candidates by providing a context for image enhancement through demonstration of techniques which could be incorporated into print exemplars.

National Unit specification: support notes (cont)

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Discussion of the appropriateness of the enhancements used and final print techniques proposed should assist candidates in their decision-making. These discussions could be framed as class critiques or tutorials providing feedback on the image enhancement and should reflect a consideration of the visual characteristics of the images being used in each case.

Outcome 4 (*Suggested 20% nominal delivery*)

Print layout including paper orientation and the use of multiple images or triptych/diptych compositions should be discussed during learning and teaching activities underpinning the planning and practical stages of this Outcome. Comparison of exemplars showing a variety of layout and paper types and finishes would be very beneficial in allowing candidates to visualise the impact these elements could have on their own images.

Outcome 5 (*Suggested 15% nominal delivery*)

It is strongly recommended that candidates be given the opportunity to experiment with a number of alternative print processes and layouts throughout this Unit. Discussion of and feedback upon these items should allow candidates opportunities to formulate and discuss the concepts required of a successful evaluation of visual impact achieved through the selected final mode of presentation.

Guidance on approaches to assessment for this Unit

It is recommended that the assessment of all Outcomes in this Unit are integrated. Integration of the planning, practical and evaluation components of this Unit should reduce assessment burden and provide a more holistic student experience. Assessment feedback for each Outcome should contribute to the preparation of candidates for the next Outcome.

The following instruments of assessment can be used:

Outcomes 1 and 2

It would be appropriate for the evidence for these Outcomes to be presented as a traditional workbook/report or as an electronic presentation.

Outcome 3

It would be appropriate for the evidence for this Outcome to be presented as an archive of a minimum of six digital files and a logbook or workbook with illustrations detailing the steps undertaken in the preparation of final files.

Outcome 4

It would be appropriate for the evidence for this Outcome to be presented as portfolio of a minimum of six prints (min A4/max A3 size) accompanied by a traditional workbook/report or as an electronic presentation that provides evidence of the development of creative and technical practice in the production of the prints

National Unit specification: support notes (cont)

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Outcome 5

It would be appropriate for the evidence for this Outcome to be presented as a traditional workbook/report or as an electronic presentation.

Further integration of assessment is possible with the following Unit:

- ◆ Photography: Portfolio Production

Opportunities for the use of e-assessment

E-assessment may be appropriate for some assessments in this Unit. By e-assessment we mean assessment which is supported by Information and Communication Technology (ICT), such as e-testing or the use of e-portfolios or e-checklists. Centres which wish to use e-assessment must ensure that the national standard is applied to all candidate evidence and that conditions of assessment as specified in the Evidence Requirements are met, regardless of the mode of gathering evidence. Further advice is available in *SQA Guidelines on Online Assessment for Further Education (AA1641, March 2003)*, *SQA Guidelines on e-assessment for Schools (BD2625, June 2005)*.

Opportunities for developing Core Skills

In this Unit candidates will develop skills in manipulating digital image files and preparing them for a variety of final output options.

Candidates will:

- ◆ research a range of digital print out-put techniques, materials and hardware devices
- ◆ devise criteria for image selection and presentation to meet the requirements of a client brief
- ◆ review their current image catalogue to identify suitable images and / or requirement to produce new images
- ◆ use a variety of pre-planned techniques to visually enhance selected image files
- ◆ prepare enhanced finished image files for print production and presentation taking layout, paper stock and output device into consideration
- ◆ produce test prints and compare layout options
- ◆ review how effective or appropriate the selection and production of image files was in meeting the requirements of the brief and how these were enhanced by digital manipulation
- ◆ review how print methods and layout influenced the impact of the images presented

This means that as candidates are doing this Unit they will be developing aspects of the Core Skills of *Communication*, *Problem Solving* and *Information and Communication Technology*.

In addition they may develop aspects of *Working with Others* through group discussions and peer review.

National Unit specification: support notes (cont)

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Disabled candidates and/or those with additional support needs

The additional support needs of individual candidates should be taken into account when planning learning experiences, selecting assessment instruments, or considering whether any reasonable adjustments may be required. Further advice can be found on our website www.sqa.org.uk/assessmentarrangements

History of changes to Unit

Version	Description of change	Date
02	Core Skill Problem Solving at SCQF level 6 embedded.	21/10/2011

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