University Hospitals of Derby and Burton
NHS Foundation Trust

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Antithrombotics and Skin Surgery in Dermatology - Summary Clinical Guideline

Reference No: CG-DERM/2018/002

STEP1: Assess procedure bleeding risk and thrombotic risks

A) Procedure risk

In practice, most skin procedures can be considered to be **low bleeding risk**.

Higher bleeding risk skin procedures include:
• Wide excision, grafts or secondary intention wounds on non-compressible sites (e.g. neck, ears, lips and periocular) • Local flaps on head and neck with wide undermining (e.g. forehead, periocular, cheek, nose, ear, neck)

For NOACs/DOACs the higher bleeding risk has been classified slightly differently:

Appendix C: Moderate bleeding risk skin procedures where NOAC/DOAC can be stopped pre-operatively
• Excision and direct closure on non-compressible sites (neck / lip /genitals / periocular including canthus and eyelids) • Excision of lesions on scalp • 1 or 2 cm wider excisions of melanoma/melanoma scars compressible site • Secondary intention wounds / partial closure with purse-string sutures, compressible site • Small flap or graft, compressible site

B) Thrombotic risk

It is important to know why the patient is on the medication to assess the thrombotic risk if the drug were stopped.

STEP 2 : Pre-operative action depending on risks and antithrombotic agent

This is summarised in Appendix A on page 3.

1) Single antiplatelet medication
[Aspirin, Dipyridamole, Clopidogrel, Prasugrel, Ticagrelor]

Higher bleeding risk procedure - book into Daycase procedures at the Royal Derby Hospital. In general, the antiplatelet agent can be continued but in some circumstances the dermatologist performing the procedure may consider stopping the agent. Discussion with the haematologist or cardiologist maybe required. See full guideline for table with time to stop antiplatelet pre-operatively if required. Agents can be restarted the next day if no significant post-operative bleeding.

2) Dual antiplatelet therapy (DAPT)

Higher bleeding risk procedure - consider waiting until DAPT is completed. If surgery cannot wait then book into Daycase procedures at the Royal Derby Hospital. In such cases please discuss with the dermatologist to whose list they are assigned. It may require discussion with the patient's cardiologist if alteration of the regimen is required to reduce the bleeding risk.

3) NOAC/DOACs
[Apixaban, Rivaroxaban, Dabigatran, Edoxaban]

Higher bleeding risk +/- moderate bleeding risk procedure - In such cases please stop the NOAC/DOACs ***(See Appendix C, page 1)***. However, if the thrombotic risk is moderate or high, discuss it with the haematologist as alternatives maybe required. If the DOAC is to be stopped it is usually 24hrs, although Dabigatran maybe 48hrs if the eGFR <60. See full guidelines for table on stopping times.

NOAC/DOACs are usually restarted the next day. As the patient is fully anticoagulated within hours of taking the medication, please ensure adequate haemostasis before restarting.

4) Warfarin

Low bleeding risk procedure - Check the indication and target range. Patients should have an INR check several days prior aiming for ***INR < 3.0***. However, there will be exceptions where the thrombotic risk is high and the indication of warfarin requires a higher target INR >3.0 e.g. metallic heart valve. Such cases should be booked on a doctor list (NOT a nurse list) and INR should be below 3.5.

Higher bleeding risk procedure – As for low risk procedure, but book for Daycase procedures at the Royal Derby Hospital. If the target INR is > 3.0 please discuss with the dermatologist to whose list they are assigned. If they require the INR to be below 3.0 then may need to discuss with the consultant haematologist as low molecular weight heparin (LMWH) cover may be required.

5) Heparin & Fundaparinux

Low bleeding risk and higher bleeding risk procedure - LMWH at prophylactic dose can be continued. If LMWH or fondaparinux is at treatment dose (PE/DVT/MI) then take advice from the prescribing specialist or haematologist. Small (<5mm) punch biopsies can be performed if urgent without discussion.

6) Other: Platelet count- if the platelet count is >50 in isolation (e.g. no disorder of platelet function) then proceed as normal. Otherwise discuss with haematologist.

Appendix A

Procedure risk	Antithrombotics	Pre-operative management of antithrombotics
Low risk procedure	+ single antiplatelet, DAPT, LMWH (prophylactic)	= No change to medication preoperatively
	+ LMWH (treatment dose) and Fondaparinux	= Delay procedure/Take advice from haematologist, unless small punch biopsy (<5mm)
	+ NOAC/DOAC	= No change to medication preoperatively
	+ warfarin	= check INR < 3.0; if target >3.0 then aim for INR < 3.5 and do procedure on doctor list
Higher risk procedure (Book into RDH daycase)	+ single antiplatelet, DAPT LMWH (prophylactic)	= No change to medication preoperatively (at discretion of dermatologist doing procedure)
	+ LMWH (treatment dose) and Fondaparinux	Take advice from haematologist
	+ NOAC/DOAC	= Stop if safe* #

	+ warfarin	= check INR <3.0; if target INR >3.0 then inform dermatologist doing procedure; take advice from haematologists if need to decrease to INR< 3.0

***see above text for antithrombotic pre-operative stopping advice**
 # See Appendix C (page 1) for moderate risk procedures for which NOAC/DOAC can be stopped if low thrombotic risk