



## A Guide to Patient and Carer Administration of Subcutaneous Medication (Palliative Care)



This instruction guide is to support you in administering subcutaneous medication  
AFTER training and assessment of competence by a registered nurse.  
Should you have any concerns, please contact your GP or a registered nurse before  
administering any medication

Community Nurse contact number (in hours):.....

Community Nurse contact number (out of hours):.....

GP contact number (in hours):.....

GP contact number (out of hours):.....

Other: .....

## Introduction

Drugs to manage symptoms (such as pain) and improve comfort in palliative care are usually given by mouth. There are some situations when injections are better than drugs given by mouth, such as when a patient is unable to swallow, or when vomiting or sleepy. Usually these injections are given by a nurse or doctor. An equivalent amount of the drug is used but it usually works a little faster. Some injectable drugs, such as insulin and blood thinning treatments are frequently given by patients or carers who have been suitably trained.

Some patients and carers may wish to be trained to give injections to manage pain and other symptoms used in palliative care and this leaflet gives more information about the process. **It is not a requirement for patients or carers to do this. If you agree to this and at any time feel you are unable to continue, the nurses will be very willing to take over the role.**

It is important to remember that patients experience symptoms at any time during their illness, even in the last few hours. It may be that an injection given to ease pain comes close to the end of life. This is not unusual and if this has been given by a carer they must not worry that the injection has in any way caused the patient's life to end.

## Medication that may be given by subcutaneous injection

Health care professionals may add other medication as appropriate.

Name of drug	Indication for use	Common side effects
Diamorphine	Pain or shortness of breath	Nausea, vomiting, constipation, dry mouth, drowsiness
Morphine	Pain or shortness of breath	Nausea, vomiting, constipation, dry mouth, drowsiness
Oxycodone	Pain or shortness of breath	Nausea, vomiting, constipation, dry mouth, drowsiness
Levomepromazine	Nausea and vomiting, sedation, agitation	Drowsiness, dry mouth Can cause pain when injected
Haloperidol	Nausea and vomiting, confusion, agitation	Drowsiness, stiffness, insomnia (poor sleep), headache
Cyclizine	Nausea and vomiting	Drowsiness, dry mouth Can cause pain when injected
Metoclopramide	Nausea and vomiting	Stiffness, diarrhoea
Midazolam	Shortness of breath, anxiety, agitation, sedation	Drowsiness
Hyoscine butylbromide	Noisy wet breathing	Dry mouth, constipation, blurred vision, difficulty passing urine
Dexamethasone	Pain, headache, nausea	High blood sugar, insomnia (poor sleep), agitation, swollen ankles, indigestion/heartburn, increased appetite

## Procedure for the administration of a subcutaneous injection via a saf-t-intima

For the sake of comfort, a nurse will often insert a simple device (saf-t-intima) under the skin, usually on the arm, so that when you give an injection you only inject into the device and not directly into the patient.

1. Wash your hands with soap and dry well.



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2. Check the injection site for redness, soreness, swelling or leaking. If there are any problems with this then **do not proceed**. **Contact a community nurse for advice.**



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3. Check the Community Prescription Chart for the time the last dose was given to make sure it is ok to give the injection. Assemble the medication - checking the dose required against the prescription chart. Ensure the medication is within the expiry date.



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4. Gather all the equipment required to prepare the injection. Ensure you have:

- Medication to be given
- Sterile water for injection (to flush)
- Syringes
- Blunt drawing up needles
- Alcohol swab
- Hard walled container
- Sharps bin
- Community Palliative Care Medication Administration Chart (WHZ061)



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5. Select appropriate size syringe – 1ml or 2ml

**No more than 2ml of injection should be given at any one time**



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6. Attach the blunt drawing up needle to the syringe



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7. Open the necessary ampoule (plastic or glass):

- A glass ampoule should be held in upright position. Check all fluid removed from neck of ampoule. If not, gently flick the top of the ampoule until the fluid runs back down into it. If there is a dot on the ampoule ensure the dot is facing away from you. Hold the ampoule in one hand, using the other hand to snap the neck of the ampoule away from you
- A plastic ampoule - simply twist the top of the ampoule until it is removed



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8. Draw up medication from the ampoule:

- a) Hold the ampoule in your non-dominant hand upside down at a slight angle or in a position that is comfortable for you such as on a table
- b) The medication should not come out of the ampoule if you tip it upside down
- c) Insert the needle into the ampoule
- d) Draw the medication into the syringe by slowly pulling back on the plunger of the syringe
- e) Once the medication is removed from the ampoule, take the needle out of the ampoule and hold the syringe with the needle pointing upright
- f) Flick the syringe with your finger to get all the air bubbles to the top, then slowly push the plunger up to expel the air bubbles from the syringe
- g) Slowly push the plunger of the syringe, emptying any excess volume into a container until you have the correct dose/amount as prescribed
- h) Use a separate syringe to draw up any other medications you may be giving and a **0.3ml sterile water flush** as above.



**Do not give more than 2mls total at any one time. This can cause pain and discomfort for the patient.**

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9. For **diamorphine** only:

- a) Draw a specified amount of sterile water for injection using the process described in section 8 a) to g). The exact amount will be documented on the 'Consent form for Patient or Carer Administration of Subcutaneous Medication (Palliative Care).
- b) Squirt the water into the opened glass ampoule containing the diamorphine powder. The diamorphine powder will quickly dissolve.

- c) Draw back the specified dose of medication. The exact volume to draw back will be documented on the 'Consent form for Patient or Carer Administration of Subcutaneous Medication (Palliative Care).
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10. Record the number of ampoules used, any wastage, batch number, expiry date and remaining stock of each medication on the Community Palliative Care Medication Administration Chart (WHZ061).

Any remaining medication and the ampoules can be disposed of into a sharps bin.

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11. Take the prepared syringes to the person in a hard walled container with a sharps bin.



**If the sharps bin is getting full, further supply can be obtained from your community nurse or on prescription from your GP surgery. Full boxes can be returned to your GP Practice or to a community nurse.**

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12. Swab the end of the bionector with an alcohol swab and wait for approx. 30 seconds for it to dry.



13. Remove the blunt needle from the syringe and place the blunt needle directly into the sharps container



14. Insert the syringe containing the medication, into the bionector. Slowly push the plunger of the syringe until the barrel is empty, and then remove the syringe. If required, insert the second syringe of medication and repeat the process as necessary.



15. Follow administration of the medication with 0.3ml of water for injection to flush the saf-t-intima.



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**16.** Discard all the syringes and any remaining needles in the sharps bin.



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**17.** Record the drug, dose date and time the medication was given on the Community Palliative Care Medication Administration Chart (WHZ061).



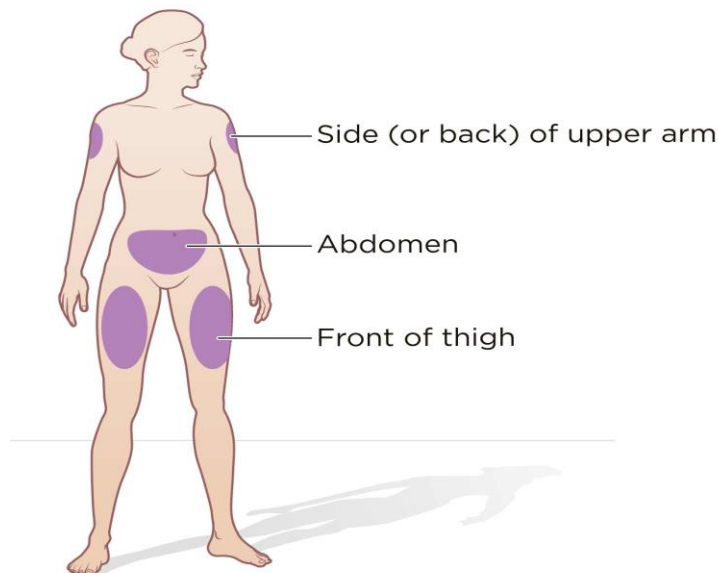
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**18.** Wash your hands thoroughly



## Procedure for the administration of a subcutaneous injection

Subcutaneous injections are given into the fatty tissue just under the skin. The following sites are recommended: abdomen around the tummy button (avoiding the tummy button itself), outer side of the upper arms and the thighs (see diagram). Avoid any area that is bruised, red or swollen with lymphoedema or for other reasons, is scarred or where the skin is broken or damaged by previous injections.



It is important to rotate sites to keep the skin healthy. Repeated injections in the same spot can cause scarring and hardening of fatty tissue that will interfere with uptake of medication. Each injection should be about 1 inch apart.

1. Wash your hands with soap and dry well

2. Check the Community Palliative Care Medication Administration Chart (WHZ061) for the time the last dose was given to make sure it is ok to give the injection. Assemble the medication - checking the dose required against the prescription chart. Ensure the medication is within the expiry date.



3. Gather all the equipment required to prepare the injection. Ensure you have:

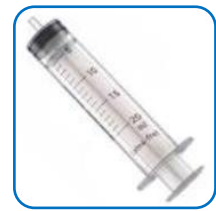
- Medication to be given
- Syringes
- Blunt drawing up needles
- Short sharp needle for giving injection
- Hard walled container
- Sharps bin
- Community Palliative Care Medication Administration Chart (WHZ061)



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4. Select appropriate size syringe – 1ml or 2ml

**No more than 2ml of injection should be given at any one time**



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5. Attach the blunt drawing up needle to the syringe



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6. Open the necessary ampoule:

- A glass ampoule should be held in upright position. Check all fluid removed from neck of ampoule. If not, gently flick the top of the ampoule until the fluid runs back down into it. If there is a dot on the ampoule ensure the dot is facing away from you. Hold the ampoule in one hand, using the other hand to snap the neck of the ampoule away from you.



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7. Draw up medication from the ampoule:

- a) Hold the ampoule in your non-dominant hand upside down at a slight angle or in a position that is comfortable for you such as on a table
- b) The medication should not come out of the ampoule if you tip it upside down
- c) Insert the needle into the ampoule
- d) Draw the medication into the syringe by slowly pulling back on the plunger of the syringe
- e) Once the medication is removed from the ampoule, take the needle out of the ampoule and hold the syringe with the needle pointing upright
- f) Flick the syringe with your finger to get all the air bubbles to the top, then slowly push the plunger up to expel the air bubbles from the syringe
- g) Slowly push the plunger of the syringe upwards or into a container until you have the correct dose/amount as prescribed
- h) Use a separate syringe to draw up any other medications you may be giving.
- i) Discard blunt needle into sharps bin and replace with small needle in preparation to give injection.



**Do not give more than 2mls total of medication at any one time. This can cause pain and discomfort for the patient.**

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**8. For diamorphine only:**

- a) Draw a specified amount of sterile water for injection using the process described in section 7 a) to g). The exact amount will be documented on the 'Consent form for Patient or Carer Administration of Subcutaneous Medication (Palliative Care).
  - b) Squirt the water into the opened glass ampoule containing the diamorphine powder. The diamorphine powder will quickly dissolve.
  - c) Draw back the specified dose of medication. The exact volume to draw back will be documented on the 'Consent form for Patient or Carer Administration of Subcutaneous Medication (Palliative Care).
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**9. Record the number of ampoules used, any wastage, batch number, expiry date and remaining stock of each medication on the Community Palliative Care Medication Administration Chart (WHZ061)**

Any remaining medication and the ampoules can be disposed of in the sharps bin

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**10. Take the prepared syringes to the person in a hard walled container with a sharps bin.**

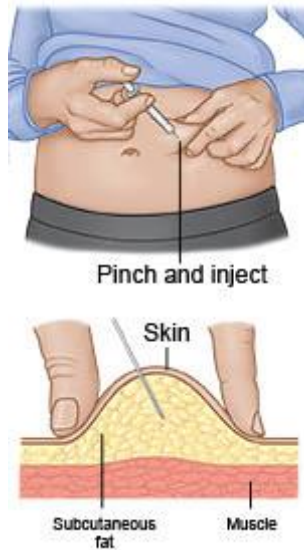
**If the sharps bin is getting full, further supply can be obtained from your community nurse or on prescription from the GP surgery. Full boxes can be returned to your GP Practice or to a community nurse.**



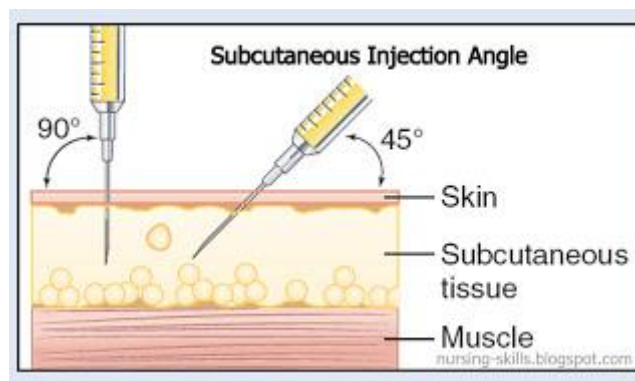
**11. Select an appropriate site –following instructions above. If the patient is receiving regular subcutaneous injections, rotate sites used. Check any paperwork to ensure site last used is not re-used at next injection.**

- a) Remove/move any clothing in order to access the chosen site. If skin is visibly dirty, wash with soap and water and then dry.
- b) **Prepare the needle.** Hold the syringe with your writing hand and pull the cover off with your other hand. Place the syringe between your thumb and first finger. Let the barrel of the syringe rest on your second finger.
- c) **Pinch the skin.** Take a big pinch of skin between thumb and index finger and hold it. (Your thumb and forefinger should be about an inch and a half apart.) This pulls the fatty tissue away from the muscle and makes the injection easier.

### Subcutaneous Injection



- d) **Inject the needle.** Inject the needle into the pinched skin at a 90-degree angle. You should do this quickly, but without great force. If the patient is very thin, you may need to inject the needle at a 45-degree angle to the skin. Once the needle is all the way in, push the plunger down slowly to inject the medicine.



- e) **Pull out the needle.** Remove the needle at the same angle that you put it in. Apply gentle pressure from a gauze pad if there is any bleeding from the injection site.
- f) Do not replace the cover on the needle. Instead place needle and syringe straight into sharps bin. If using a 'Safety Needle' then the needle needs to be pushed into the protective cap and then placed in the sharps bin.



12. Record the drug, dose date and time the medication was given on the Community Palliative Care Medication Administration Chart (WHZ061).



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**13. Wash your hands thoroughly**

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**Contact a nurse or doctor in the following circumstances:**

- If you feel unsure as to whether or not you should give an injection
- If symptoms persist despite the medication given
- If there is an unexpected problem such as a needle stick injury
- If you are concerned that the wrong drug or the wrong dose of a drug or other error has occurred this must be reported immediately
- For additional supplies of equipment and medication
- If you would no longer like to administer subcutaneous medication

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