Diabetes

1. **Notification**
   The parent/carer of the pupil should be advised in school handbook and enrolment form of the need to notify the school that the pupil has Type 1 diabetes (diabetes). Pupils who have diabetes are at risk of variable blood glucose and will need treatment in school with insulin.

2. **School Healthcare Plan**
   Form 9: School Healthcare Plan – Diabetes 'Veo' insulin pump and, if required, supplementary Continuous Glucose Monitoring for 'Veo' pump plan
   OR
   Form 9: School Healthcare Plan - Diabetes '640G or 670G' Insulin Pump and, if required, supplementary Continuous Glucose Monitoring for '640' pump plan
   OR
   Form 9: School Healthcare Plan – Diabetes insulin injection
   OR
   Form 9: School Healthcare Plan - Diabetes 'Omnipod' Insulin Pump
   OR
   Form 9: School Healthcare Plan - Diabetes 'T:Slim X2' Insulin Pump and, if required, supplementary Continous Glucose Monitoring for 'T:Slim X2' pump plan
   Form 9: School Healthcare Plan – Diabetes Ypsomed with CamAPS
   should be completed for all pupils who have diabetes by the parent/carer and the school. Support in completing the school healthcare plan can be sought through the Diabetes Nurse Specialists. The plan should be reviewed every year.

3. **Awareness/Continuing Professional Development - Requirements for all Schools**
   The head teacher should ensure that all teaching and support staff are aware of these procedures pertaining to a pupil's condition and the particulars of any needs that may arise in school. The head teacher is responsible for ensuring all school staff are aware of the arrangements to manage a medical emergency.
   The head teacher should encourage staff to volunteer to undertake the administration of appropriate emergency treatments. The head teacher should enable these staff to attend the earliest available ASL: Diabetes – Managing Diabetes in Educational Establishments session available through the Continuing Professional Development Directory. For further details on CPD, see section 4.3.
   The Specialist Diabetes Nurse will visit the schools of pupils newly diagnosed with diabetes and give advice and information to staff directly involved with that pupil.

4. **The School Curriculum**
   Diabetes should not impede any area of the curriculum for pupils in school. Arrangements must be made to allow pupils with diabetes to carry out blood glucose testing, treat hypoglycaemia (low blood glucose), administer insulin and eat additional carbohydrate if required. A pupil with diabetes must not be delayed from receiving a meal when insulin has been given.
   Pupils with diabetes should not be prevented from attending residential excursions. The Diabetes Nurse Specialist should be contacted on 0131 536 0375 prior to residential excursions.

5. **Review of School Healthcare Plans**
   School Healthcare Plans will be reviewed annually and if there are any changes in treatment. If there are no changes, the Agreement to School Healthcare Plan Review sheet should be completed and signed as indicated. If there are any significant changes a new school healthcare plan should be completed.

6. **Checklist of General School Arrangements**
   The following summarises general school arrangements;
   - All school staff, supply teachers, visiting teachers and support staff should be made aware of pupils with

diabetes and of these procedures.

Diabetes – continued

- The class register should be clearly marked to indicate pupils with diabetes so that when a supply teacher takes a class she/he is aware of any pupils with diabetes in that class.
- All staff who may have direct day-to-day responsibility for the pupil should be familiar with the School Healthcare Plan.
- Pupils should carry a supply of glucose. An emergency box of supplies should be kept in a central, easily accessible place.
- A list of staff who have attended an ASL: Managing Diabetes in an Educational Establishment within the last two years should be displayed clearly in the school office.
- The relevant parties as indicated on the form must sign the School Healthcare Plan
- The parent/carer has responsibility for the contents of the emergency box of supplies. As a matter of good practice, the school should check the expiry date of all medication and send home Form 6a/Notice to parent/carer that medication needs replenishing (Appendix 8) to indicate when the supplies are becoming low.
- Procedures for summoning emergency services (Appendix 20) should be clearly displayed by all telephones.
- Should a pupil require emergency treatment the instructions on the HYPOglycaemia or HYPERglycaemia (as appropriate) Care Flow Diagram must be followed.
- The Diabetes Nurse Specialists should be contacted if a pupil has frequent periods of absence with diabetes given as the reason for their absence.

Form 9: School Healthcare Plan for 'Ypsomed and CamAPS Insulin Pump

Pupil's name	Photograph of pupil
Date of birth	
CHI	
Address	
School	

This plan should be completed by the pupil's parent/carer and, where it involves the administration of medication, it must be approved by the hospital consultant/specialist nurse/GP.

Name of approving clinician	
Signature	**Date**

(A letter detailing medication/care and signed by the hospital consultant/specialist nurse or GP can replace this signature)

Signature of parent/carer	**Date**

Once completed, the parent/carer is responsible for taking a copy of this School Healthcare Plan to all relevant hospital/GP appointments for updating.

Pupil's name	**Date of Birth**

Parent/Carer Contact 1 **Parent/Carer Contact 2**

Name	**Name**
Relationship to pupil	**Relationship to pupil**
Address	**Address**
☎ Home	**☎ Home**
☎ Work	**☎ Work**
☎ Mobile	**☎ Mobile**

Hospital/Clinic Contact **General Practitioner**

Name	**Name**
Address	**Address**
☎	**☎**

Signature of parent/carer	**Date**

Pupil's name	Date of Birth

What is Diabetes?

Diabetes (type 1) is a condition that develops when a person does not produce enough of the hormone insulin. Insulin allows the glucose from the food we have eaten, to move from the bloodstream into the cells, where it can be used for energy.

People who develop diabetes (type 1) in childhood require insulin by injection or insulin pump therapy. A healthy, balanced diet is recommended and carbohydrate counting of all food is required to ensure that the correct amount of insulin is given.

Carbohydrates are divided into 2 groups:

1. Sugary carbohydrates e.g. sweet biscuits, chocolate, fruit and some dairy products.
2. Starchy carbohydrates e.g. bread, cereals, pasta and rice.

What is an Insulin Pump?

An insulin pump is a way of giving insulin. Rather than injecting insulin up to 5 times a day the pump delivers a background (Basal) rate of insulin. The child/carer will then inform the pump of BG level (Dependent on glucose meter) and carbohydrate intake to allow a bolus dose of insulin to be delivered prior to food being eaten.

What is Continuous Glucose Monitoring (CGM)?

Some pupils will have their interstitial glucose levels measured by a continuous glucose monitor which is a device that measures interstitial glucose levels every 5 minutes and sends these readings to their insulin pump. As it is measuring interstitial glucose it can lag behind blood glucose levels. CGM does not take away the need for blood glucose testing but can be used to provide extra information about blood glucose trends.

The CGM is set with limits of acceptable glucose levels and will alert via the insulin pump if these limits are reached. If this pupil has a CGM please make sure that the supplementary CGM plan is completed.

What is Hybrid Closed Loop?

This is a system comprised of 3 components that work together to mimic an unaffected pancreas. One component is the insulin pump, the next component is a CGM sensor, and the last component is an application (APP), this app can use the real time information from the CGM and make a decision on the amount of insulin required to maintain good control. A hybrid closed loop device is NOT able to administer extra insulin for food automatically. As such, the system must be given the appropriate information to calculate the required amount of insulin.

Details of Medication/Equipment (Delete as appropriate)

Medication /Equipment	Dose	Comments
Glucose tablets	**3 tablets**	**As per HYPOglycaemia action flow chart**
Glucose powder	**2 teaspoons dissolved in 10–20ml of water**	**As per HYPOglycaemia action flow chart**
Glucogel	**1 tube**	**As per HYPOglycaemia action flow chart**
Blood glucose meter	**N/A**	**For checking blood glucose levels.**
Ketone Meter	**N/A**	**As per HYPERglycaemia action flow chart**

Signature of parent/carer	**Date**

Form 9: School Health Care Plan for 'Ypsomed and CamAPS' Insulin Pump
Page 4 of 8

Pupil's name	Date of Birth

What the school needs to know:

1. How to use the insulin pump (IMPORTANT: Member of school staff who will be administering the insulin via the pump and those who are supervising the child doing their own administration)
2. How to manage and treat 'hypos'
3. How to manage and treat hyperglycaemia and how to check for ketones.
4. Where supplies are kept (Hypo Kit, Spare Sets and Insulin Pens)
5. When and where to get help (detailed in Health Care Plan)
6. How to disconnect set for PE/Swimming

Details of Care:

_____has Type 1 Diabetes and has an insulin pump which administers insulin on a continuous basis. Their medical care is managed by the RHSC Paediatric Diabetes Team and parents/carers are fully trained to manage and make decisions about their child's care.

Because of _____ age he/she cannot take full responsibility for managing her/his diabetes. These are the things that they need help from school staff with: (Delete as appropriate)

- Hypoglycaemia: the child must NOT be left on their own until the Hypo has been resolved. Hypoglycaemia should be treated where/when ever it occurs.
- _____ can/cannot assist with the practical aspects of their blood glucose testing but needs an adult to support/supervise and make the decision whether he/she is hypoglycaemic or hyperglycaemic and the action required.
- At times of snacks and meals _____ needs direct support to administer their dose of insulin via the insulin pump.
- Awareness of the where the set is situated on child's body. These areas are specific to individual children i.e. Tummy, Upper Thighs, Buttocks.
- _____ does/does not require assistance after toilet visits or P.E. If clothes require changing ensure the set has not been dislodged OR disconnected.

CONTACT PARENTS IMMEDIATELY IF YOU SUSPECT THE SET HAS BEEN DISLODGED.

This Health Care Plan has been devised so that those using it can navigate easily to the correct information and flowchart as required.

Signature of parent/carer	Date

Form 9: School Health Care Plan for 'Ypsomed and CamAP' Insulin Pump
Page 5 of 8

Pupil's name	Date of Birth

Details of Routine Care:

Blood Glucose should be checked at the following times (complete times as appropriate):

- Mid Morning –
- Pre Lunch –
- Mid Afternoon –

READING	ACTION
4.0 – 13.9 mmol/l	1. Record BG in diary/communication book provided by parent. 2. Bolus for snack/lunch using Bolus button **(see page 6)** Carbohydrate content will be clearly marked by parents. 3. It is important to ensure that the child eats the meal that they have had insulin for. If any concerns contact parents.
Below 4.0 mmol/l 'Hypo'	1. Follow **HYPO**glycaemia flow chart 2. Observe child until hypo has resolved. It can take up to 45 minutes for full concentration to return following a hypo.
14.0 mmol/l or higher	1. Follow **HYPER**glycaemia flow chart

Details of Care for P.E.

1. Check blood glucose before activity.
2. If blood glucose is less than 4mmol/l follow the HYPOglycaemia flowchart before continuing.
3. If blood sugar is above 14mmol/l refer to the HYPERglycaemia flowchart before continuing.
4. If blood glucose is less than _____, give _____ a snack of ____gms. WITHOUT bolus of insulin.

Ease off Mode on CAMAPS

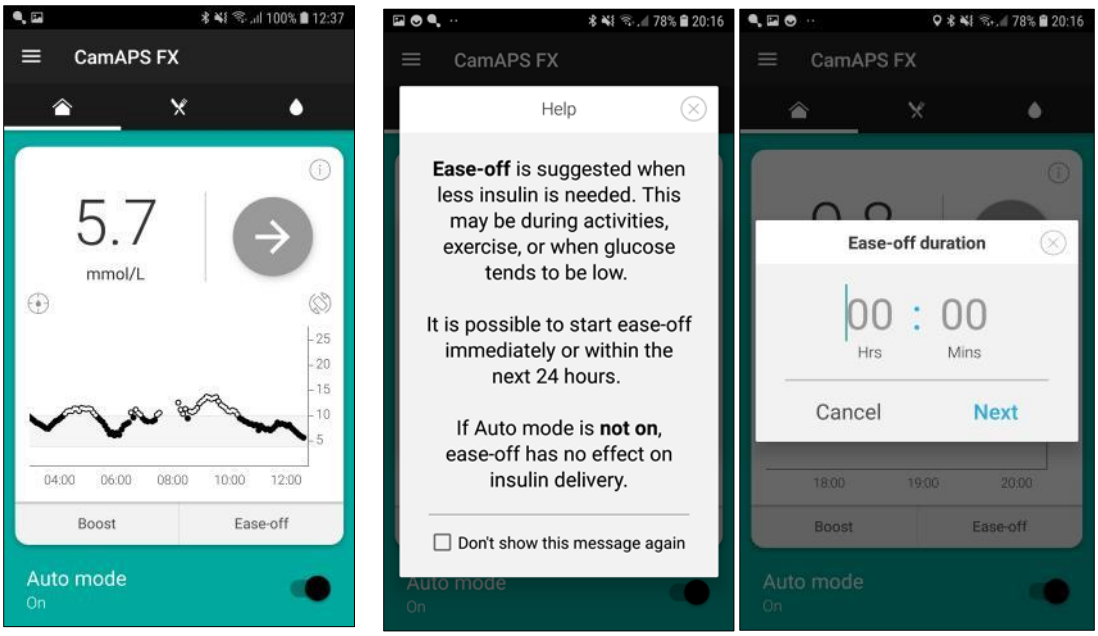
'Ease-off' can be used when less insulin is needed. **This could be during exercise or when glucose tends to be low.** You will be able to set up the duration (from 0 to 24 hours) and the time you want the 'Ease-off' to start. Please see PE/Exercise Advice for specific information on using this. The Diabetes Team in Lothian recommend that you use **Ease Off Mode** for 1hr pre activity, the duration of the activity and 1 hour post activity. Therefore, if your PE lesson is an hour, then you will put Ease Off Mode on for 3 hours.

Instructions

Tap on the 'Ease-off' tab on the home screen.

Help screen appears, read then dismiss.

'Ease-off duration' window appears; tap in the Hrs/Mins entry fields to enter duration.



Tap 'Next'

'Ease-off start' window appears; tap 'Confirm' if you want 'Ease-off' to start immediately.

Blue 'Ease-off' status tab appears below the graph showing that 'Ease-off' is now active; note the timer on the left of the tab indicating how much time is left before 'Ease-off' expires.

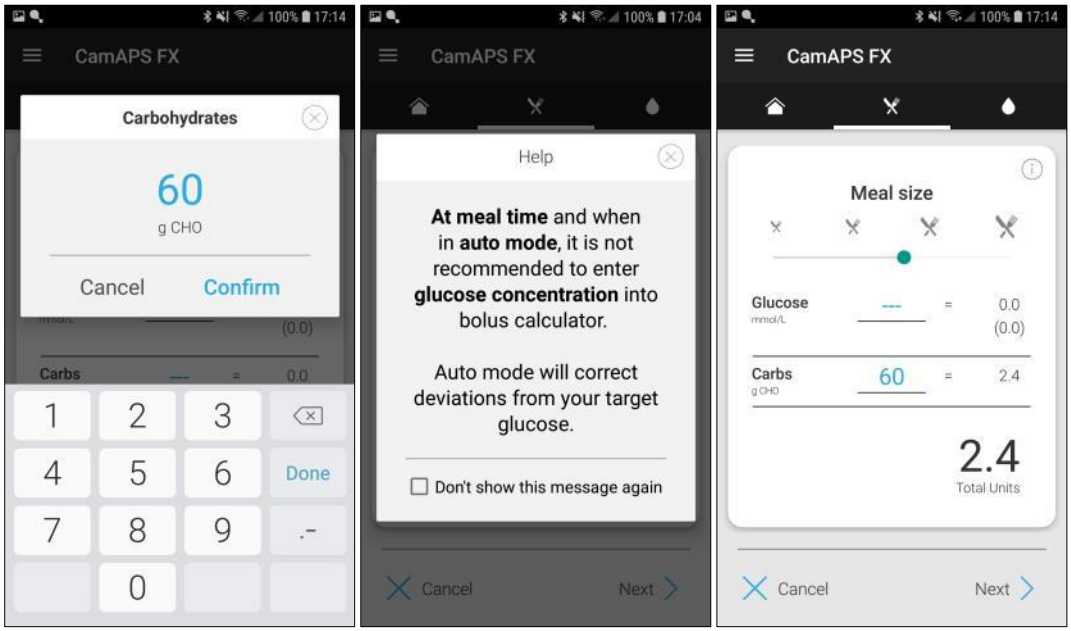
Pupil's name	**Date of Birth**

Instructions for how to bolus with 'Ypsomed with CamAPS' Insulin Pump:

A bolus has to be given for all carbohydrates that are consumed in School, unless it is for PE

To start a meal bolus:

- Tap the 'Carbs' entry field and enter the size of meal in the units shown; alternatively, tap on one of the pre-defined meal size icons along the selection line at the top to select a small, medium, large or a very large meal (these can be personalised via 'Meal size' in 'Settings'); tap 'Confirm' when ready.
- Help screen appears advising not to enter glucose level when bolusing for a meal while in Auto mode; if you wish to delete the glucose level just tap in the Glucose entry field again, delete the value and leave the field blank then tap 'Confirm'.
- Bolus amount based on your pump insulin-to-carb ratio appears to the right of the 'Carbs' amount; Total amount of insulin to be delivered as bolus is shown at the bottom; tap 'Next' to start the delivery.



Signature of parent/carer	**Date**

Form 9: School Health Care Plan for 'Ypsomed with CamAPS' Insulin Pump
Page 7 of 8

This Plan was completed on _____ and its contents agreed by the undersigned.

Pupil's name	Date of birth
School	

Parent/carer

I realise that the school is not obliged to undertake healthcare and that any healthcare provided by school will be carried out on a voluntary basis under the guidance of NHS staff. I give my consent to the information contained in this healthcare plan being shared with all staff working with my child. I give my consent for the school to contact the named health care professional(s) and for those professionals to advise the school in any relevant matters in connection with this. I accept full responsibility for keeping the school informed of anything that may be relevant in relation to the implementation of this care. I accept responsibility for ensuring that there are supplies of any relevant medication, materials or equipment for my child's needs.
I wish my child to have the care/medication detailed in this plan and I accept that the emergency services will be summoned, where appropriate, if the school staff are unable to administer the plan at any time.

Name of parent/carer	
Signature	Date

Pupil

I agree to the care arrangements as detailed in this plan

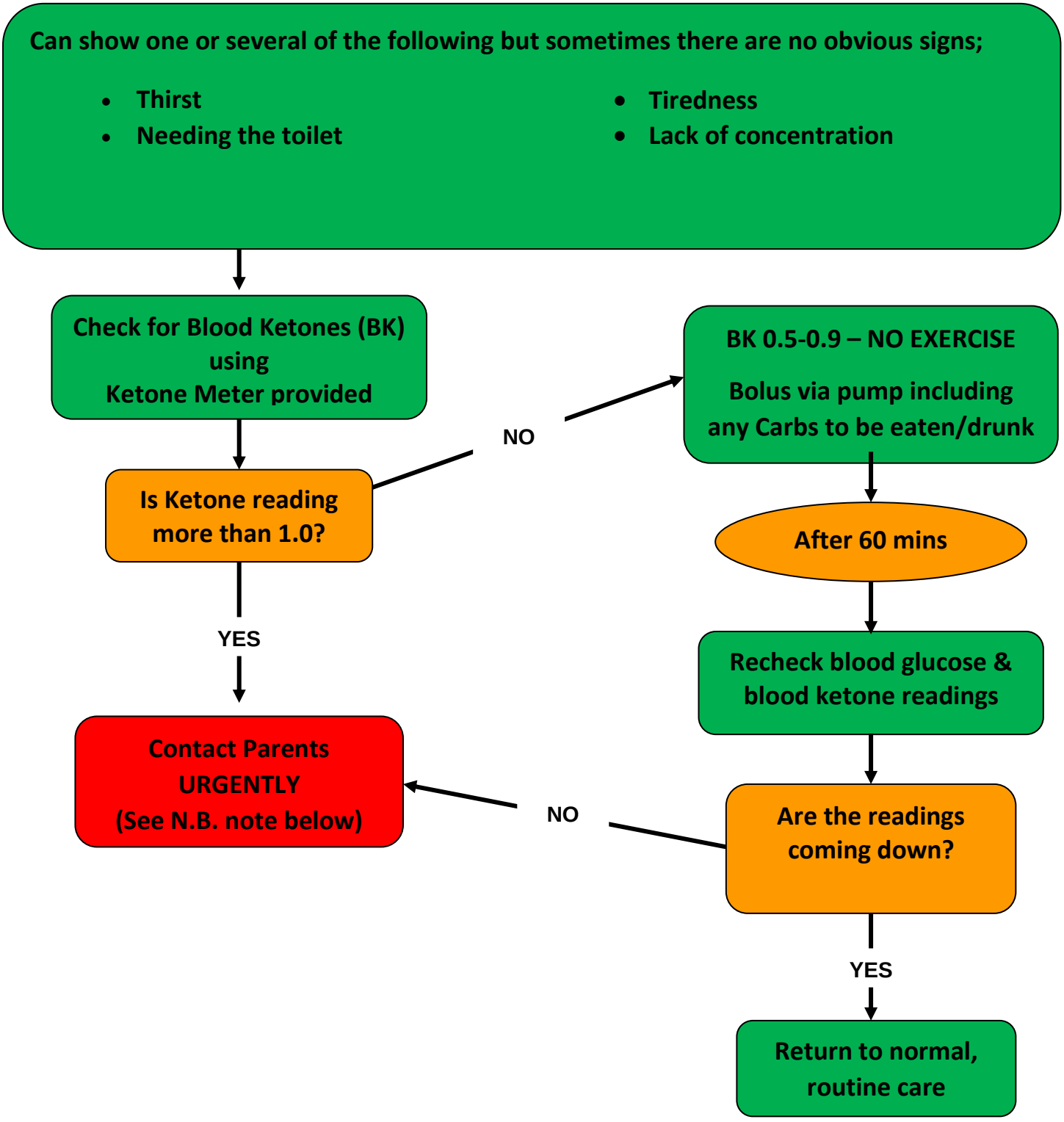
Name of pupil	
Signature	Date

The Head teacher/ Designated member of senior management
I agree to the procedures detailed in this plan being administered by appropriately trained staff who have attended a Diabetes Management CPD session within the last two years.
In the event that these procedures cannot be implemented at any time, where appropriate, the school will follow advice received from the health professionals in summoning the emergency services.

Name of member of staff	
Signature	Date

Insulin Pump Therapy in Schools Flow Chart to Manage Hyperglycaemia; Blood Glucose of more than 14mmols

Name _____ **Date of Birth** _____



N.B.: If the child requires additional insulin to be administered via an insulin pen device and a set change it is the parent's responsibility to manage this.

Insulin Pump Therapy in Schools Flow Chart to Manage HYPOglycaemia; Blood Glucose of Less Than 4.0 mmol/l

Photograph of pupil

Name **Date of Birth**

Can show one or several of the following but sometimes there are no obvious signs;

- Headache
- Pale
- Sweaty
- Tearful/weepy
- Nausea/vomiting
- Blurred vision
- Wobbly/shaky/weak
- Grumpy/bad tempered
- Feeling "not right"

Wash and dry child's hands then check blood glucose reading

Is reading less than 4.0 mmol/l?

NO → **No Action Required**

YES

Give fast acting Glucose immediately.
3 Glucose tablets
or
2 teaspoons of Glucose Powder
or
1 bottle of Lift glucose shot

Is the child becoming uncooperative or losing consciousness?

NO → **After 10 – 15 minutes recheck Blood Glucose.**

NO → **Is reading still less than 4.0mmol/l?**

YES → **Give fast acting Glucose immediately.**

YES

- **Dial 999 for an ambulance stating that the pupil has diabetes and has low blood glucose.**
- **Follow instruction given by ambulance control staff**
- **Contact parent/carer**
- **If the pupil becomes unconscious, place in recovery position.**
- **DO NOT ATTEMPT TO GIVE ANYTHING BY MOUTH**

N.B. If Hypo is not resolved after 3 cycles of treatment, contact parents for advice but continue the cycle of treat-

Notes:

When using an insulin pump, once B.G. above 4mmol/l a snack is NOT essential. If giving a snack post hypo, please deliver an insulin bolus for the carbohydrate about to be eaten.