

Exercise and Hypoglycaemia

Exercise is really important for everyone whether they have diabetes or not. It is essential for physical fitness and is a good way of maintaining a healthy weight. Regular exercise helps insulin work better and may even help reduce the amount of insulin that you need. However, exercise can cause blood glucose levels (BGLs) to fall, and cause a 'hypo'.

There are two ways you can avoid 'hypo's' related to exercise:

- Eat extra carbohydrate to cover the exercise
- Reduce the insulin dose that is working at the time that you are exercising. You may also need to reduce the insulin dose given before bed particularly after a big exercise day.

A lot of young people exercise as a way of keeping in shape, so the last thing they want to do is eat a whole lot of extra food to avoid 'hypos'! If you are unsure of which insulin to reduce or by how much, speak to your diabetes educator.

Tips to help prevent 'hypo's' when exercising

- Have some quick-acting carbohydrate drinks such as fruit juice, cordial or ordinary soft drink available when exercising
- It is a good idea to check your BGL **before** and **after** exercise so you get to know how much your BGL is likely to change with different types of exercise. Where performance is really important, or if exercise is prolonged, also check your BGL **during** exercise eg. at half time during a sporting match
- You can either take extra carbohydrate **before** exercise or **reduce** your dose of insulin. Even if you have reduced your dose of insulin, if the exercise is prolonged you may still need to take some carbohydrate **during** the exercise e.g. marathons, iron man competitions
- It is a good idea to take a BGL **before bed** on days when you have done lots of exercise. This is because exercise can continue to lower your BGL hours after the exercise has stopped. You may need to reduce your 'before bed' dose of insulin to prevent a 'hypo' during the night
- If you are involved in exercise at a time when you are usually resting (e.g. evening karate class or a dance), either **take less** insulin or take some **extra** carbohydrate.
- For endurance sports like marathons or triathlons you may find sports drinks useful (providing they contain adequate glucose). You will need to discuss this with your dietitian.

Remember to always carry Hypo treatment with you

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References:

1. Ambler, G., Barron, V., May, C., Westman, E., (1998) *Caring for Diabetes in Children and Adolescents. A Parent's Manual*. National Capital Printing, Australia
2. Stillman, J., Lang, E., Grieve, C., (2003) *Paediatric and Adolescent Diabetes Education Manual, For Health Professionals*. Queensland Health, Queensland Government Publication. Module 5

