

# rTMS FAQ



### What happens if I can't make a session?

For rTMS to be fully effective, it is important that you attend all sessions. If you are unable to make a session you must contact the clinic you are attending to advise them of your absence. Foothills Medical Centre 403-944-1491 Rockyview General Hospital 403-943-8851. We require 48 hours' notice for planned absences. Arrangements can be made to accommodate a missed session. If you have 2 no shows, the psychiatrist will speak with you. If there are more than 3 sessions missed throughout the course of treatment, you may be discharged from the program.

# What happens when the treatments are completed?

Once the treatments are complete, you will be scheduled for follow up appointments at 1 month, 3 months and 6 months.

# I'm halfway through my treatments and I feel much better, can I stop?

No. It is recommended that you complete the full course of treatment. We encourage you to discuss how you are feeling with the nursing staff on each visit.

# Where do I park?

If you have questions regarding parking, please contact the location that you are scheduled at for assistance. Foothills Medical Centre 403-944-1491 Rockyview General Hospital 403-943-8851. There may be discounted parking options available. Parking maps for the two sites are online:

<a href="https://www.albertahealthservices.ca/fmc/page14404.aspx">https://www.albertahealthservices.ca/fmc/page14404.aspx</a>
 <a href="https://www.albertahealthservices.ca/assets/info/park/if-pmap-rockyview-general-hospital.pdf">https://www.albertahealthservices.ca/assets/info/park/if-pmap-rockyview-general-hospital.pdf</a>

### What does it cost?

Treatment is covered by Alberta Health, but patients are responsible for parking and transportation expenses.

# Are there any activity restrictions during rTMS treatment?

No. Most people do not require any recovery period after completing a session of rTMS, and may continue their daily activities as usual. There are no restrictions on driving before or after rTMS treatments. If you are working, you do not need to stop working to undergo rTMS so long as your schedule can accommodate the treatment visits.



# What you need to know about repetitive transcranial magnetic stimulation (rTMS)

# What is repetitive transcranial magnetic stimulation (rTMS)?

Repetitive transcranial magnetic stimulation (rTMS) is a non-invasive procedure that uses a magnetic pulse to stimulate particular areas of the brain. rTMS has been proven to be effective and safe. Any side effects are mild and do not last very long.

rTMS can target the parts of the brain that are involved in depression. Depression is typically treated with medications and psychotherapy. When those interventions don't work, the depression is called "treatment-resistant". rTMS may be able to help people with treatment-resistant depression. The benefits may last for months, and some patients even fully recover.

# Who can benefit from rTMS?

- People who have tried medications for depression without success
- People who are unable to tolerate antidepressant medications
- People who are able to attend daily sessions over a 6 week period

### How does rTMS work?

An rTMS machine generates a series of fast magnetic pulses through an electromagnetic coil placed close to the head. These pulses are targeted to stimulate specific parts of the brain to treat depression. When these brain regions are stimulated, they become more active. This allows for better control of the symptoms of depression. rTMS is done in a clinic, or a hospital by a trained technician who is supervised by a psychiatrist. It does not require sedation or an anesthetic.

# What are the risks and side effects of rTMS?

 rTMS has been proven to be generally safe and comfortable. Most side effects range from mildto-moderate, and happen during the rTMS session or shortly afterwards.  Also, patients seem to find these side effects more tolerable over repeated sessions. In some very rare cases, there may be more significant side effects.

#### **Common side effects:**

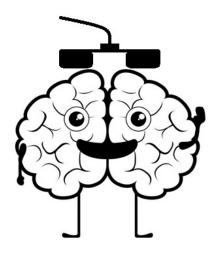
- A headache during or after treatment. Patients can take over-the-counter headache medicine if needed
- Mild tingling or itching at the point of stimulation. This fades quickly after the rTMS stops.

#### Rare side effects:

- Involuntary facial muscle reactions, including spasms, tingling or twitching. This only occurs during rTMS treatment. If truly uncomfortable, the position of the coil can be moved slightly to reduce this effect.
- Feelings of light-headedness or dizziness. This fades quickly after the rTMS stops.

#### Very rare side effects:

- Less than 1% chance of induced mania or hypomania.
- A very small chance of seizure (about 1 in 10,000 people). The staff is trained to handle this situation.





# What should I expect from rTMS treatment?

For rTMS to be effective, you will typically receive treatment daily for four to six weeks. The first session takes an hour and a half, and the rest of the sessions will take one hour or less. You may receive treatment in a private or semi-private room.

#### **Before treatment**

To be considered for rTMS treatment, you will need to be referred by a psychiatrist or your family doctor. Should your referral be accepted, you will then be scheduled for an appointment to do a psychiatric consultation to determine if rTMS is right for you.

### You will be asked to:

- Get a physical exam to ensure that you are suited for the treatment.
- Complete questionnaires and assessments before and during your treatment to help us determine your response to treatment.

# First rTMS session

This session will be longer (60-90 minutes), as we must establish the amount of magnetic energy to use in your treatment.

- We'll make sure that you feel relaxed, comfortable and safe. We will determine the best placement of the rTMS coil on your head. This differs from person to person
- The rTMS machine produces repetitive click sounds, therefore, hearing protection will be provided. The tapping or clicking sound will be faster as the treatment is delivered.
- The rTMS electromagnetic coil sends a series of repeated pulses. It sounds like tapping or clicking that lasts several seconds. You will also likely feel a tapping sensation on your forehead, which is perfectly normal.
- We will determine your "motor threshold". This
  is the amount of energy your brain requires for
  treatment. We do this by stimulating a part of
  the brain that controls a muscle in your hand,
  and we will increase the stimulation energy until
  your finger or hand twitches.

• We will then target the appropriate brain region and begin treatment. You can expect your appointment to be approximately one hour.

# Remaining rTMS sessions

These sessions will be like the treatment portion of your first session.

You will need to complete some questionnaires about your symptoms at different points of your treatment:

- After 10 sessions (halfway through your planned treatment course)
- At the end of treatment
- One month after treatment
- Three months after treatment
- Six months after treatment

This will help us monitor your progress over time.

### After treatment

Your treatment does not require a stay in the clinic or hospital and has few side effects. As a result, many people can return to their daily routine after their treatment session.



# Can a family member come with me?

You may bring a family with you, but they will not be permitted in the treatment room. They are welcome to wait during your treatment. Pets, other than service dogs are not permitted on the unit.

### I am under the age of 18, can I access treatments?

No. Treatments are for those aged 18 or over

### Can I consume alcohol?

No. It is advised that stopping the consumption of all alcoholic beverages at minimum 1 week before treatments begin and during the full treatment course.

#### Can I use Cannabis or CBD oil?

Those using Cannabis products may not respond well to rTMS treatment. If you continue to use these substances during treatment, rTMS may not be as effective.

# Are there any prescription medications that I cannot take during rTMS treatments?

Yes, there are several medications that may delay or reduce the effectiveness of treatment. Those medications include benzodiazepines, sleep aids, mood stabilizers and anti-epileptic medications. Please talk to your Dr. if you have concerns about any of the medications listed.

### How long does each treatment last?

Depending on the rTMS protocol that is chosen for you by your doctor, each treatment will last between 3 and 37.5 minutes.

### Is rTMS treatment the same as ECT?

No. rTMS treatment is different from ECT. ECT uses electric currents to induce a seizure, while rTMS uses magnetic pulses to stimulate the brain in a non-invasive way. There are fewer side effect with rTMS and it does not require the use of anesthesia.

### Are the results from rTMS treatments permanent?

rTMS is not a permanent treatment, and relapse after treatment is possible. Typically, the effects of rTMS will last for 6 months in 90% of cases, and generally last for 6-12 months. However, if relapse does occur, repeat rTMS is possible. Those who respond to rTMS once will usually respond to rTMS again in the future if it is needed.

