

Patient Guide to Pediatric Intrathecal Radioimmunotherapy (RIT)

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This guide will help you prepare for your intrathecal radioimmunotherapy (RIT) at Memorial Sloan Kettering Cancer Center (MSK). For the rest of this resource, our use of the words “you” and “your” refers to you or your child. Bring this guide with you every time you come to MSK so that you and your healthcare team can refer to it throughout your care.

About Intrathecal RIT and Monoclonal Antibodies

MSK is participating in several clinical trials (research studies) using a treatment called intrathecal RIT. Intrathecal RIT uses antibodies to treat certain types of cancer in the brain, spine, and leptomeninges (membranes that surround the brain and the spinal cord). The antibody is delivered directly to the fluid surrounding your brain and spinal cord, called cerebrospinal fluid (CSF). The type of antibody used in this treatment is called a monoclonal antibody. Below are common questions about intrathecal RIT.

What is an antibody?

An antibody is a protein that is made by your body’s immune system when it detects harmful substances, such as bacteria, fungi, parasites, and viruses.

What is a monoclonal antibody?

A monoclonal antibody is an antibody that is made in a lab and is specially designed to attach to cancer cells. The antibody has liquid radiation attached to it. This radiation kills the cancer cells directly without damaging normal tissue in the brain or spine. This type of treatment is called RIT.

What happens during intrathecal RIT?

During intrathecal RIT, the monoclonal antibody is injected directly into your CSF through an Ommaya reservoir. This is a quarter-sized, soft, plastic, dome-shaped device that is placed under your scalp during a surgery. If you already have a programmable ventriculoperitoneal (VP) shunt, the antibody can be injected into the VP shunt reservoir.

Notes _____

Notes _____

The information in this section will help you prepare for your treatment. Read through this section when your treatment is scheduled and refer to it as the date gets closer. It contains important information about what you need to do before your treatment. Write down any questions you have and be sure to ask your doctor or nurse.

Preparing for Your Treatment

Meet With Your Doctor and Nurse Practitioner

You will meet with your doctor and nurse practitioner (NP) before you begin treatment. They will review the details of the treatment, including side effects and what to expect before, during, and after your treatment. You will be asked to sign a consent form. Your doctor or NP may also recommend that you see other healthcare providers, such as a child life specialist or social worker.

Your treatment team will include your doctor, NP, research nurse, nuclear medicine doctor, and radiation safety officer. Your radiation safety officer will go over the safety precautions that you will need to follow during your treatment.

A financial counselor will be available to meet with you to discuss any insurance issues. Please bring all your insurance information to the appointment. If you have any questions, call Patient Financial Services at (212) 639-7925.

Please bring the following with you to your appointment:

- ☐ A list of all the medications you take, including patches and creams
- ☐ Insurance card
- ☐ The name(s) and telephone number(s) of your doctor(s)

 **Write down your appointment information below.**

Date: _____ Time: _____

Location and Parking

Your appointment will be at the Pediatric Day Hospital (PDH).

The PDH is located at the main hospital.

Memorial Hospital
1275 York Avenue (between East 67th and East 68th Streets)
New York, NY 10065
Take the B elevator to the 9th floor

Parking at the main hospital is available in the garage on East 66th Street between York and First Avenues. To reach the garage, enter East 66th Street from York Avenue. The garage is located about a quarter of a block in from York Avenue, on the right-hand (north) side of the street. There is a pedestrian tunnel that goes from the garage into the hospital. If you have questions about prices, call (212) 639-2338.

There are also other parking garages located on East 69th Street between First and Second Avenues, East 67th Street between York and First Avenues, and East 65th Street between First and Second Avenues.



Housing

The Ronald McDonald House provides temporary housing for out-of-town pediatric cancer patients and their families.

MSK also has arrangements with several local hotels and housing facilities that may give you a special reduced rate. Your social worker can discuss your options and make reservations.

For questions about housing, call the Social Work service at (212) 639-7041(neuro-oncology patients) or (212) 639-7011(neuroblastoma patients).

Tumor Testing

Depending on the type of tumor you have, you may need testing to see if the antibody will attach itself to the tumor. If the antibody does not attach itself to the tumor, you cannot have intrathecal RIT. Your doctor will discuss this with you.

Ommaya Reservoir or Programmable VP Shunt Reservoir

During your treatment, the antibody will be injected directly into either an Ommaya reservoir or a programmable VP shunt reservoir. If you have a nonprogrammable VP shunt, it may be converted to a programmable VP shunt if possible.

If you need to have an Ommaya reservoir placed or your nonprogrammable VP shunt converted to a programmable VP shunt, your doctor or NP will arrange this for you.

Check the box next to which procedure you will have below.

☐ **Placement of an Ommaya reservoir**

You will have an Ommaya reservoir placed during a surgery. For more information, please read *About Your Ommaya Reservoir Placement Surgery*, located in the “Resources” section of this guide.

☐ **Conversion of a nonprogrammable VP shunt to a programmable VP shunt**

Your nonprogrammable VP shunt will be converted to a programmable VP shunt during a surgery. For more information about a programmable VP shunt, please read *About Your Programmable VP Shunt for Pediatric Patients* and *Patient Guide to Pediatric Ventriculoperitoneal (VP) Shunt Surgery*, located in the “Resources” section of this guide.

 **If you have a programmable VP shunt, write down your shunt type and pressure setting below.**

Type of programmable VP shunt: _____

Pressure setting: _____

Your NP will also give you a wallet card to fill out. Carry it with you at all times.

Within 3 Weeks Before the First Antibody Injection

You will need to have the following exams and tests to make sure that it is safe for you to have antibody therapy:

- Physical exam
- Neurological exam
- Blood tests to check your blood counts and kidney, liver, and thyroid function
- Pregnancy test for females of childbearing age
- Tests to check for cancer cells in your CSF
- Magnetic resonance imaging (MRIs) of your brain and spine to make sure there is no new or growing disease
- CSF flow study to make sure your Ommaya reservoir or programmable VP shunt reservoir is working correctly

Write down the dates and times of your brain and spine MRIs below.

	Date	Time
Brain MRI		
Spine MRI		

CSF Flow Study

A CSF flow study is done to make sure that your Ommaya reservoir or programmable VP shunt reservoir is working well. During the flow study, your doctor or NP will inject a radioactive dye into your reservoir. You will have a nuclear medicine scan a few hours later to see how well the dye moves through your CSF. You will have another nuclear medicine scan about 24 hours later, and if necessary, a third scan about 48 hours later.

If you will need to have anesthesia (medication to make you sleepy) during your scans, your doctor or NP will arrange this for you. You will not be able to eat or drink anything for a certain amount of time before the scans. Your NP will go over these guidelines with you. **If you do not follow these guidelines, your scans may be cancelled.**

 **Write down your eating and drinking guidelines before your scans below.**

5 to 7 Days Before the First Antibody Injection

You will start taking medications called potassium iodide (SSKI) and liothyronine (Cytomel®) 5 to 7 days before the first antibody injection. These medications will help protect your thyroid during treatment.

You will take these medications every day until 2 weeks after the last antibody injection. For more information about these medications, please read *Potassium Iodide* and *Liothyronine*, located in the “Medications” section of this guide.

Write down each dose that you take in your *Medication Diary*, located in the “Medications” section of this guide. Be sure to write down any missed doses in your diary. Bring the diary to all of your appointments.

Write down the information about taking potassium iodide and liothyronine below.

Start Date	End Date	Medication	Dose	How Often
		Potassium iodide (SSKI)	7 drops	Once a day
		Liothyronine (Cytomel®)	☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	Once a day

The Night Before Each Antibody Injection

The night before each antibody injection, you will take a steroid called dexamethasone (Decadron®). This medication is given to control inflammation. You will also take the dexamethasone:

- Two times the day of each injection
- Two times the first day after each injection
- One time the second day after each injection

You will also take an antacid with the dexamethasone. Take the antacid as prescribed by your doctor. For more information, please see *Instructions for Home Medications*, located in the “Medications” section of this guide.

Please refer to the dexamethasone schedule for each antibody injection below. You will take a total of 6 doses for each injection.

Write down the dates you will take dexamethasone and the dose below.

	Dates	Morning	Evening	Dose
Night before each antibody injection				
Day of injection (this dose will be given in the PDH)				
1 st day after injection				
2 nd day after injection				

Notes _____

The information in this section will tell you what to expect during your treatment, including the procedures you will have and the medications you will take. Write down any questions you have and be sure to ask your doctor or nurse.

The Day of Your Treatment

Where to Go

The antibody injections are given in the PDH, usually on an outpatient basis. Treatment side effects can usually be taken care of in the outpatient clinic, but sometimes patients need to be admitted to the hospital. Your doctor will discuss any possible side effects with you before you begin treatment.

The PDH is located at the main hospital.

Memorial Hospital
1275 York Avenue (between East 67th and East 68th Streets)
New York, NY 10065
Take the B elevator to the 9th floor

See page 6 for parking information and a map of the area.

When to Arrive

Your appointment time will be between 8:00 am and 9:00 am. Please arrive on time.

What to Expect

You will be given a private room in the PDH. Your doctor or NP will give you a physical exam and send blood work to the lab before the injection.

There may be a little bit of wait time before the injection. During this time, you can go to the playroom, use a computer, etc.

Ommaya Reservoir Tap

If you have an Ommaya reservoir, you will have a procedure called an Ommaya reservoir tap during your antibody injections and during routine check-ups after your antibody therapy is finished.

Your doctor or NP will do the procedure at your bedside. You do not need to do anything to prepare for it.

During the procedure, you may be asked to lie on your back. Your doctor or NP will clean the skin over the top of your Ommaya reservoir with Betadine®. Tell your doctor or NP if you're allergic to iodine and a different solution will be used.

A small needle with tubing attached to it will be inserted into the reservoir. A small amount of your CSF will be taken out through a syringe that is attached to the tubing.

If you're getting the antibody injection during your tap, your doctor or NP will inject it slowly into your Ommaya reservoir after the sample of your CSF is taken out. This usually does not hurt. Depending on your treatment, you may need to have more samples of your CSF taken after the injection. The needle will be left in your Ommaya reservoir for a few hours after the injection to take these samples.

If you are having a tap during a routine check-up after your antibody therapy is finished, a sample of your CSF will be taken and the needle will be removed right away.

You do not need to follow any restrictions after the tap. You can wash your hair as usual.

Programmable VP Shunt Reservoir Tap

The procedure for a programmable VP shunt reservoir tap is almost the same as an Ommaya reservoir tap, as described on page 12. The only difference is that the shunt is turned off before the antibody injection. It will stay off for about 4 hours after the injection.

Test Dose Injection

Your first antibody injection is called a test dose. Your doctor will inject a small amount of the antibody into your Ommaya reservoir or programmable VP shunt reservoir. After the injection, the tube coming from your Ommaya reservoir or programmable VP shunt reservoir will be carefully taped to your head for several hours. This will allow for samples of your CSF to be taken at various times.

Before the Test Dose Injection

Before your doctor or NP gives you the injection, samples of your blood and CSF will be taken.

You will be given antinausea medication, acetaminophen (Tylenol®) to prevent fever, an antihistamine to prevent an allergic reaction, and pain medication.

After the Test Dose Injection

You do not need to follow any radiation precautions after the injection. There are no restrictions for being around pregnant women after the injection.

30 minutes to 4 hours after the test dose injection

Samples of your blood and CSF will be taken about every hour for 4 hours after the injection.

1 hour after the test dose injection

About 1 hour after the injection, you will be given an antibiotic medication through an intravenous (IV) line to help prevent infection.

4 hours after the test dose injection

About 4 hours after the injection, you will have:

- Your first nuclear medicine scan
- An Ommaya reservoir or programmable VP shunt reservoir tap
- Blood samples taken

 **Write down the date and time of your first nuclear medicine scan below.**

Date: _____ Time: _____

Every 4 to 6 hours for 24 hours after the test dose injection

You can take acetaminophen every 4 hours for 24 hours after the injection to prevent fever and pain. You can also take antinausea and pain medications as directed by your doctor. Your NP will go over these medications with you.

For more information about home medications, please see *Instructions for Home Medication*, located in the “Medications” section of this guide.

24 hours after the test dose injection

About 24 hours after the injection, you will have:

- Your second nuclear medicine scan
- An Ommaya reservoir or programmable VP shunt reservoir tap
- Blood samples taken

 **Write down the date and time of your second nuclear medicine scan below.**

Date: _____ Time: _____

Instructions:

- Continue to take the dexamethasone twice a day with the antacid.
- Continue to take the potassium iodide and liothyronine every day until the end date written in the table on page 9.

48 hours after the test dose injection

About 48 hours after the injection, you will have:

- Your third nuclear medicine scan
- An Ommaya reservoir or programmable VP shunt reservoir tap
- Blood samples taken

 **Write down the date and time of your third nuclear medicine scan below.**

Date: _____ Time: _____

Instructions:

- Take the last dose of dexamethasone with the antacid.
- Continue to take the potassium iodide and liothyronine every day until the end date written in the table on page 9.

Treatment Dose Injections

One week after the test dose injection, you will start getting the full antibody dose injections. This is also called the treatment dose. You will follow the same procedures that you did for the test dose injection. However, you will not need to have any nuclear medicine scans after the injections.

Depending on the type of antibody you will be receiving, you may have blood and CSF samples taken after the injections.

The injections are given in what are called rounds or cycles. The number of rounds you have will depend on your treatment plan. Your doctor will discuss this with you.

Radiation Safety Precautions

After the injection, your radiation safety officer will talk with you about what precautions you will need to follow. You also will be given written guidelines to follow.



Tell your radiation safety officer if anyone who is caring for you is pregnant or if you are staying at the Ronald McDonald House.

Notes _____

Notes _____

The information in this section will tell you what to expect after your treatment. Write down any questions you have and be sure to ask your doctor or nurse.

2 Weeks After the Last Treatment Dose Injection

You can stop taking the potassium iodide and liothyronine 2 weeks after the last treatment dose injection. This end date is written in the table on page 9. Ask your doctor or NP to confirm this date with you.

Complete the *Medication Diary* in the “Medications” section of this guide and give it to your doctor or NP.

3 Weeks After the Last Treatment Dose Injection

About 3 weeks after the last test dose injection, you will have:

- MRIs of your brain and spine
- An Ommaya reservoir or programmable VP shunt reservoir tap
- Blood samples taken
- A physical exam

Write down the date and time of your MRI scans below.

	Date	Time
Brain MRI		
Spine MRI		

Follow-up Care

After your antibody therapy is finished, you will have a follow-up appointment with your doctor and NP.

 **Write down the date and time of your follow-up appointment below.**

Date: _____ Time: _____

When to Call Your Doctor or NP

Call your doctor or NP immediately if you have:

- A temperature of 100.4° F (38.0° C) or higher
- Increased pain
- Increased sleepiness
- Severe headaches
- Severe nausea and vomiting
- Any other questions or concerns

Contact Information

If you have any questions or concerns, please talk with your doctor or NP. You can reach them Monday through Friday from 9:00 am to 5:00 pm. Call the office directly at (212) 639-3751 (neuro-oncology patients) or (212) 639-6410 (neuroblastoma patients).

After 5:00 pm, during the weekend, and on holidays, please call (212) 639-2000 and ask for the pediatric oncology fellow on call.

To speak with a social worker, call:

(212) 639-7041 (neuro-oncology patients)

(212) 639-7011 (neuroblastoma patients)

Notes _____

The information in this section contains important information about what medications you will take before and after your treatment. Read through this section before your treatment so that you are prepared. Write down any questions you have and be sure to ask your doctor or nurse.

Medication Diary

Please initial in each box when the medication is taken. Bring this form to all of your appointments.

Date	Time	Medication			
		Potassium iodide (SSKI) Dose	Initials	Liothyronine (Cytomel®) Dose	Initials
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	

Date	Time	Medication			
		Potassium iodide (SSKI) Dose	Initials	Liothyronine (Cytomel®) Dose	Initials
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	
		7 drops		☐ 25 mcg (1 tablet) ☐ 37.5 mcg (1 ½ tablets) ☐ 50 mcg (2 tablets)	

Participant signature: _____ Date: _____

Reviewer's signature: _____

Date reviewed/signed: _____

Instructions for Home Medications

Before the Injections

☐ **Dexamethasone (Decadron®)**

Instructions: Take _____ mg by mouth twice a day, starting the night before injection and continue for a total of 6 doses. On the days of injection, you will receive this medication in the PDH.

☐ **Ranitidine (Zantac®)**

Instructions: Take _____ mg by mouth twice a day on the days when you take the dexamethasone. On the days of injection, you will receive this medication in the PDH.

☐ _____

Instructions: _____

☐ _____

Instructions: _____

After the Injections

☐ **Hydromorphone (Dilaudid®)**

Instructions: Take _____ mg by mouth every 4 to 6 hours if needed for headache or pain.

☐ **Hydroxyzine (Vistaril®)**

Instructions: Take _____ mg by mouth every 4 to 6 hours if needed for nausea/vomiting.

☐ **Lorazepam (Ativan®)**

Instructions: Take _____ mg by mouth every 4 to 6 hours if needed for nausea/vomiting or agitation.

☐ **Ondansetron (Zofran®)**

Instructions: Take _____ mg by mouth every 8 hours if needed for nausea/vomiting. On days of injection, you will receive this medication in the PDH.

☐ **Acetaminophen (Tylenol®)**

Instructions: Take _____ mg by mouth every 4 to 6 hours for 24 hours after the injection and then every 6 hours as needed for headache/body aches.



Please remember to take the potassium iodide (SSKI) and liothyronine (Cytomel®) every day until you are told to stop. Please refer to the *Medication Diary* for more information.

Contact Information

If you have any questions or concerns, please talk with your doctor or NP. You can reach them Monday through Friday from 9:00 am to 5:00 pm. Call the office directly at (212) 639-3751 (neuro-oncology patients) or (212) 639-6410 (neuroblastoma patients).

After 5:00 pm, during the weekend, and on holidays, please call (212) 639-2000 and ask for the pediatric oncology fellow on call.



Potassium Iodide

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You must carefully read the "Consumer Information Use and Disclaimer" below in order to understand and correctly use this information

Pronunciation(poe TASS ee um EYE oh dide)

Brand Names: U.S.SSKI; ThyroShield [OTC]

Warning

- Sometimes drugs are not safe when your child takes them with other drugs. Taking them together can cause bad side effects. This is one of those drugs. Be sure to talk to your child's doctor about all the drugs your child takes.

What is this drug used for?

- It is used to treat an overactive thyroid gland.
- It is used to prevent thyroid cancer from radiation.
- It is used to thin mucous so it can be taken from the body by coughing.
- It may be given to your child for other reasons. Talk with the doctor.

Is it safe for my child to take this drug?

- Not if your child has an allergy to potassium iodide or any other part of this drug.
- Be sure to let the doctor know if your child has any allergies or side effects to drugs, foods, or dyes. Make sure to tell about the allergy and what signs your child had. This includes telling about rash; hives; itching; shortness of breath; wheezing; cough; swelling of face, lips, tongue, or throat; or any other signs.
- Not if your child has any of these health problems: Enlarged thyroid gland (goiter), high potassium levels, or kidney disease.

What are some things I need to know or do while my child takes this drug?

- Keep a list of all your child's drugs (prescription, natural products, vitamins, OTC) with you. Give this list to your child's doctor.
- If your child has lung disease, talk with the doctor.
- If your child has myotonia congenital or TB (tuberculosis), talk with your child's doctor.
- Have your child's blood work checked often. Talk with your child's doctor.
- Check all drugs your child is taking with your child's doctor. This drug may not mix well with some other drugs.

- If your child is taking a blood thinner, have his/her blood work checked. Talk with your child's doctor.

What are some side effects that I need to call my child's doctor about right away?

- If any of this news causes you to be worried, any of the unwanted side effects happen, or if your child is not better after taking this drug.
- If you think there has been an overdose, call your poison control center or get medical care right away. Be ready to tell or show what was taken, how much, and when it happened.
- If your child shows signs of a very bad reaction, call your child's doctor or the ER right away. These include wheezing; chest tightness; fever; itching; bad cough; blue skin color; seizures; swelling of face, lips, tongue, or throat; or if your child is not acting normal.
- If your child has a fast heartbeat.
- If your child has flu-like signs.
- If your child has very bad belly pain.
- If your child has a very bad upset stomach or is throwing up.
- If your child has any bruising or bleeding.
- If your child has swelling.
- If your child has numbness or tingling in his/her hands or feet.
- If your child is feeling very tired or weak.
- If your child gets a rash.
- If your child's health problem does not get better or if you think your child's health problem is worse.

What are some other side effects of this drug?

- Rash.
- Bad taste in your mouth. This most often goes back to normal.
- Upset stomach or throwing up. Many small meals and good mouth care may help. Older children may suck hard, sugar-free candy.
- Feeling tired or weak.

How is this drug best given?

Give this drug as ordered by your child's doctor. Read and follow the dosing on the label closely.

- Give this drug with or without food. Give with food if it causes an upset stomach.

Liquid (solution/syrup):

- Give this drug with water, milk, or juice.
- Do not use if it turns brownish-yellow.

Expectorant:

-

Have your child drink lots of noncaffeine liquids every day unless told to drink less liquid by your child's doctor.

Radiation exposure:

- Give this drug only when told to by public health officials.
- Give once a day until the chance of being exposed to radiation ends.
- You may crush the tablet and mix it with water, low fat white or chocolate milk, infant formula, orange juice, flat soda, or raspberry syrup.

What do I do if my child misses a dose?

- Give a missed dose as soon as you think about it.
- If it is close to the time for your child's next dose, skip the missed dose and go back to your child's normal time.
- Do not give 2 doses or extra doses.
- Do not change the dose or stop your child's drug. Talk with your child's doctor.

How do I store and/or throw out this drug?

- Store at room temperature.
- Store in a dry place. Do not store in a bathroom.
- Protect from light.

General drug facts

- If your child's symptoms or health problems do not get better or if they become worse, call your child's doctor.
- Do not share your child's drugs with others and do not give anyone else's drug to your child.
- Keep a list of all your child's drugs (prescription, natural products, vitamins, OTC) with you. Give this list to your child's doctor.
- Talk with your child's doctor before giving your child any new drug, including prescription or OTC, natural products, or vitamins.
- Some drugs may have another patient information leaflet. If you have any questions about this drug, please talk with your child's doctor, pharmacist, or other health care provider.

Consumer Information Use and Disclaimer: This information should not be used to decide whether or not to take this medicine or any other medicine. Only the healthcare provider has the knowledge and training to decide which medicines are right for a specific patient. This information does not endorse any medicine as safe, effective, or approved for treating any patient or health condition. This is only a brief summary of general information about this medicine. It does NOT include all information about the possible uses, directions, warnings, precautions, interactions, adverse effects, or risks that may apply to this medicine. This information is not specific medical advice and does not replace information you receive from the healthcare provider. You must talk with the healthcare provider for complete information about the risks and benefits of using this medicine.



Liothyronine

Printed on 2014-05-30

You must carefully read the "Consumer Information Use and Disclaimer" below in order to understand and correctly use this information

Pronunciation(lye oh THYE roe neen)

Brand Names: U.S.Cytomel; Triostat

Brand Names: CanadaCytomel®

Warning

- Do not use this drug to treat obesity or for weight loss. Very bad and sometimes deadly side effects may happen with this drug if it is taken in large doses or with other drugs for weight loss. Talk with your doctor.

What is this drug used for?

- It is used to add thyroid hormone to the body.

Is it safe for my child to take this drug?

- Not if your child has an allergy to liothyronine or any other part of this drug.
- Be sure to let the doctor know if your child has any allergies or side effects to drugs, foods, or dyes. Make sure to tell about the allergy and what signs your child had. This includes telling about rash; hives; itching; shortness of breath; wheezing; cough; swelling of face, lips, tongue, or throat; or any other signs.
- Not if your child has any of these health problems: Overactive thyroid gland or a weak adrenal gland.

What are some things I need to know or do while my child takes this drug?

- Keep a list of all your child's drugs (prescription, natural products, vitamins, OTC) with you. Give this list to your child's doctor.
- Do not run out of this drug.
- If your child has a heart disease, talk with the doctor.
- If your child has high blood sugar (diabetes), you will need to watch his/her blood sugar closely.
- Have your child's blood work checked. Talk with your child's doctor.
- Check all drugs your child is taking with your child's doctor. This drug may not mix well with some other drugs.
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Do not give your child iron products, antacids that have aluminum or magnesium, calcium carbonate, simethicone, sucralfate, Kayexalate®, colestipol, or cholestyramine within 4 hours of this drug.

What are some side effects that I need to call my child's doctor about right away?

- If any of this news causes you to be worried, any of the unwanted side effects happen, or if your child is not better after taking this drug.
- If you think there has been an overdose, call your poison control center or get medical care right away. Be ready to tell or show what was taken, how much, and when it happened.
- If your child shows signs of a very bad reaction, call your child's doctor or the ER right away. These include wheezing; chest tightness; fever; itching; bad cough; blue skin color; seizures; swelling of face, lips, tongue, or throat; or if your child is not acting normal.
- If your child has chest pain or pressure or a fast heartbeat.
- If your child has trouble breathing.
- If your child is feeling very nervous and excitable.
- If your child has a big weight gain.
- If your child has a big weight loss.
- If your child gets a rash.
- If your child's health problem does not get better or if you think your child's health problem is worse.

What are some other side effects of this drug?

- Feeling more or less hungry.
- A change in weight without trying.
- Nervous and excitable.
- Shakiness.
- Bothered by heat.
- Sweating a lot.
- Headache.
- Upset stomach or throwing up. Many small meals and good mouth care may help. Older children may suck hard, sugar-free candy.
- Loose stools (diarrhea).
- Grouchy or touchy.
- Leg cramps.
- Not able to sleep.

How is this drug best given?

Give this drug as ordered by your child's doctor. Read and follow the dosing on the label closely.

- Take on an empty stomach before breakfast.
- Give as you have been told, even if your child feels well.

What do I do if my child misses a dose?

- Give a missed dose as soon as you think about it.
- If it is close to the time for your child's next dose, skip the missed dose and go back to your child's normal time.
- Do not give 2 doses or extra doses.
- Do not change the dose or stop your child's drug. Talk with your child's doctor.

How do I store and/or throw out this drug?

- Store at room temperature.
- Store in a dry place. Do not store in a bathroom.
- Protect from light.

General drug facts

- If your child's symptoms or health problems do not get better or if they become worse, call your child's doctor.
- Do not share your child's drugs with others and do not give anyone else's drug to your child.
- Keep a list of all your child's drugs (prescription, natural products, vitamins, OTC) with you. Give this list to your child's doctor.
- Talk with your child's doctor before giving your child any new drug, including prescription or OTC, natural products, or vitamins.
- Some drugs may have another patient information leaflet. If you have any questions about this drug, please talk with your child's doctor, pharmacist, or other health care provider.

Consumer Information Use and Disclaimer: This information should not be used to decide whether or not to take this medicine or any other medicine. Only the healthcare provider has the knowledge and training to decide which medicines are right for a specific patient. This information does not endorse any medicine as safe, effective, or approved for treating any patient or health condition. This is only a brief summary of general information about this medicine. It does NOT include all information about the possible uses, directions, warnings, precautions, interactions, adverse effects, or risks that may apply to this medicine. This information is not specific medical advice and does not replace information you receive from the healthcare provider. You must talk with the healthcare provider for complete information about the risks and benefits of using this medicine.

This section contains the resources that were referred to throughout this guide. These resources will help you prepare for your treatment and recover safely. Write down any questions you have and be sure to ask your doctor or nurse.