ULTOMIRIS®
(ravulizumab-cwvz)
injection for intravenous use
300 mg/3 mL vial

Making the Switch from SOLIRIS® (eculizumab) to ULTOMIRIS® (ravulizumab-cwvz) for patients with Paroxysmal Nocturnal Hemoglobinuria (PNH)

Frequently Asked Questions and Answers

INDICATION

What is ULTOMIRIS?

ULTOMIRIS is a prescription medicine used to treat adults and children 1 month of age and older with a disease called Paroxysmal Nocturnal Hemoglobinuria (PNH). It is not known if ULTOMIRIS is safe and effective in children younger than 1 month of age.

SELECT IMPORTANT SAFETY INFORMATION

What is the most important information I should know about ULTOMIRIS?

ULTOMIRIS is a medicine that affects your immune system and may lower the ability of your immune system to fight infections.

- **ULTOMIRIS increases your chance of getting serious meningococcal infections that may quickly become life-threatening or cause death if not recognized and treated early.**

1. You must complete or update meningococcal vaccine(s) at least 2 weeks before your first dose of ULTOMIRIS.
2. If you have not completed your meningococcal vaccines and ULTOMIRIS must be started right away, you should receive the required vaccine(s) as soon as possible.
3. If you have not been vaccinated and ULTOMIRIS must be started right away, you should also receive antibiotics for as long as your healthcare provider tells you.
4. If you had a meningococcal vaccine in the past, you might need additional vaccines before starting ULTOMIRIS. Your healthcare provider will decide if you need additional meningococcal vaccines.
5. Meningococcal vaccines do not prevent all meningococcal infections. **Call your healthcare provider or get emergency medical care right away if you get any of these signs and symptoms of a meningococcal infection**: fever, fever with high heart rate, headache and fever, confusion, muscle aches with flu-like symptoms, fever and a rash, headache with nausea or vomiting, headache with a stiff neck or stiff back, or eyes sensitive to light.

Remember to speak with your doctor about your symptoms and how to manage PNH

Please see the full Prescribing Information (Ultomiris.com/PI) and Medication Guide (Ultomiris.com/MedGuide) for ULTOMIRIS, including Boxed WARNING regarding serious meningococcal infections. Please see Indication and Important Safety Information throughout and on page 9.

WHAT ARE KEY THINGS TO KNOW WHEN SWITCHING FROM SOLIRIS TO ULTOMIRIS?

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1. What is the difference between SOLIRIS® (eculizumab) and ULTOMIRIS?

- ULTOMIRIS was built on the foundation of SOLIRIS, but with modifications that allow it to last longer in the body.[1,2] This allows ULTOMIRIS to keep working longer between infusions—so that you only need to be infused every 8 weeks, instead of every 2 weeks with SOLIRIS.[3] ULTOMIRIS is infused every 8 weeks for most people and every 4 weeks for children weighing less than 44 pounds (20 kilograms).

After your starting dose, you only need to be infused every 8 weeks, instead of every 2 weeks

2. How does the efficacy of ULTOMIRIS compare to SOLIRIS?

- In the largest PNH program to date, ULTOMIRIS was studied in patients with PNH, including those new to treatment and those previously treated with SOLIRIS.
- ULTOMIRIS demonstrated comparable efficacy to SOLIRIS in both PNH clinical trials.[3]

ULTOMIRIS demonstrated comparable efficacy to SOLIRIS in both PNH clinical trials

3. Is ULTOMIRIS more expensive than SOLIRIS?

- ULTOMIRIS is priced to be less expensive than SOLIRIS for an average patient.[4]
- The exact amount you will pay depends upon your insurance provider and coverage plan.
- Your OneSource™ Support Specialist can help you determine your exact out-of-pocket costs and whether copay assistance may be available.

ULTOMIRIS is priced to be less expensive than SOLIRIS for an average patient

SELECT IMPORTANT SAFETY INFORMATION (CONT'D)

Your healthcare provider will give you a Patient Safety Card about the risk of serious meningococcal infection. Carry it with you at all times during treatment and for 8 months after your last ULTOMIRIS dose. Your risk of meningococcal infection may continue for several months after your last dose of ULTOMIRIS. It is important to show this card to any healthcare provider who treats you. This will help them diagnose and treat you quickly.

ULTOMIRIS is only available through a program called the ULTOMIRIS and SOLIRIS Risk Evaluation and Mitigation Strategy (REMS). Before you can receive ULTOMIRIS, your healthcare provider must: enroll in the REMS program; counsel you about the risk of serious meningococcal infections; give you information about the signs and symptoms of serious meningococcal infection; make sure that you are vaccinated against serious infections caused by meningococcal bacteria, and that you receive antibiotics if you need to start ULTOMIRIS right away and are not up to date on your vaccines; give you a **Patient Safety Card** about your risk of meningococcal infection.

ULTOMIRIS may also increase the risk of other types of serious infections, including *Streptococcus pneumoniae, Haemophilus influenzae,* and *Neisseria gonorrhoeae*. Your child should receive vaccines against *Streptococcus pneumoniae* and *Haemophilus influenzae* type b (Hib) if treated with ULTOMIRIS. Certain people may be at risk of serious infections with gonorrhea.

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ALEXION® AstraZeneca Rare Disease

4. How does ULTOMIRIS work?

- Part of your immune system called Complement Protein 5 ("C5") plays an important role in helping your body destroy foreign or damaged cells. Normally, control mechanisms in your body keep C5 and other complement proteins from attacking healthy cells.[5]
- In PNH, these control mechanisms fail, and uncontrolled C5 activity results in destruction of red blood cells, or "hemolysis". This hemolysis is what ultimately leads to the blood clots, strokes, heart attacks, kidney disease, and organ damage that are seen in PNH.[6]
- ULTOMIRIS works by binding to C5 and inhibiting its activity to prevent hemolysis from occurring.[1,3]

ULTOMIRIS works by binding to C5 and inhibiting its activity to prevent hemolysis

5. Does ULTOMIRIS block C5 immediately after the first infusion, or is there a delay before C5 is controlled?

- ULTOMIRIS controls C5 immediately. 100% (222/222) of clinical trial patients on ULTOMIRIS had complete C5 control by the end of their first infusion.[3]

ULTOMIRIS controls C5 immediately

6. If ULTOMIRIS is dosed every 8 weeks, does it "wear off" near the end of the treatment cycle?

- ULTOMIRIS is administered as a starting dose followed by maintenance doses every 8 weeks starting 2 weeks after the starting dose.[3]
- With ULTOMIRIS, C5 control is sustained, meaning it lasts the full 8 weeks between infusions for adult patients.[3]
- You can feel confident in complete and sustained C5 control with ULTOMIRIS.[3]

With ULTOMIRIS, C5 control is sustained for 8 weeks

SELECT IMPORTANT SAFETY INFORMATION (CONT'D)

Who should not receive ULTOMIRIS?
Do not receive ULTOMIRIS if you have a serious meningococcal infection when you are starting ULTOMIRIS.

Before you receive ULTOMIRIS, tell your healthcare provider about all of your medical conditions, including if you: have an infection or fever, are pregnant or plan to become pregnant, and are breastfeeding or plan to breastfeed. It is not known if ULTOMIRIS will harm your unborn baby or if it passes into your breast milk. You should not breastfeed during treatment and for 8 months after your final dose of ULTOMIRIS.

Tell your healthcare provider about all the vaccines you receive and medicines you take, including prescription and over-the-counter medicines, vitamins, and herbal supplements which could affect your treatment.

WHAT RESULTS WERE SEEN IN PNH PATIENTS WHO TOOK ULTOMIRIS?

7. What results were seen in PNH patients who switched from SOLIRIS to ULTOMIRIS?

- Study design:[3]
  - 26-week study of adult patients (N=195) with PNH who were treated with SOLIRIS for ≥6 months
- Primary endpoint:
  - Hemolysis, measured by percent change in lactate dehydrogenase (LDH, a marker that measures PNH activity) from baseline[3,7]

Nearly 9 of 10 people who received ULTOMIRIS did not need a transfusion

People who took ULTOMIRIS had levels of LDH that stayed stable over time

People who took ULTOMIRIS had no breakthrough hemolysis[a]

(0% of patients in ULTOMIRIS group vs 5.1% of patients in SOLIRIS group)

At 6 months, 76% of both people who took ULTOMIRIS and people who took SOLIRIS had stable levels of hemoglobin

None of the ULTOMIRIS patients experienced breakthrough hemolysis vs 5.1% of SOLIRIS patients

[a]Breakthrough hemolysis is defined as experiencing at least 1 new or worsening sign or symptom of hemolysis that occurs along with elevated LDH levels (after LDH levels were previously reduced through treatment).

8. How extensively has ULTOMIRIS been studied?

- ULTOMIRIS has been studied in 4 Phase 3 clinical trials, with over 500 patients across 2 diseases, including PNH.[3]
- The two Phase 3 studies of ULTOMIRIS in PNH patients were the largest clinical trials ever conducted in PNH.[7]
- ULTOMIRIS is the #1 prescribed treatment for patients with PNH, and is preferred over SOLIRIS by 93% of PNH patients.[8,b]

4 Phase 3 clinical trials with over 500 patients across 2 diseases, including PNH

ULTOMIRIS is the #1 prescribed treatment for patients with PNH

[b]Patient preference data from a sub-study presented in 2019. The objective of this study was to assess patient preference for ravulizumab or eculizumab treatment in clinical trial sub-study ALXN1210-PNH-302s, using an 11-item PNH Patient Preference Questionnaire (PNH-PPQ©). Ninety-five patients completed the PNH-PPQ. A significantly higher proportion of patients reported a preference for ravulizumab (93%, 95% confidence interval [CI]: 87%–98%; $P < 0.001$) as compared to patients who reported either a preference for eculizumab or no preference (7%, 95% CI: 2%–12%).

SELECT IMPORTANT SAFETY INFORMATION (CONT'D)

If you have PNH and you stop receiving ULTOMIRIS, your healthcare provider will need to monitor you closely for at least 16 weeks after you stop ULTOMIRIS. Stopping ULTOMIRIS may cause breakdown of your red blood cells due to PNH. Symptoms or problems that can happen due to red blood cell breakdown include: drop in your red blood cell count, tiredness, blood in your urine, stomach-area (abdomen) pain, shortness of breath, blood clots, trouble swallowing, and erectile dysfunction (ED) in males.

What are the possible side effects of ULTOMIRIS?
ULTOMIRIS can cause serious side effects including infusion-related reactions. Symptoms of an infusion-related reaction with ULTOMIRIS may include lower back pain, abdominal pain, muscle spasms, changes in blood pressure, tiredness, feeling faint, shaking chills (rigors), discomfort in your arms or legs, bad taste, or drowsiness. Stop treatment of ULTOMIRIS and tell your healthcare provider right away if you develop these symptoms, or any other symptoms during your ULTOMIRIS infusion that may mean you are having a serious infusion-related reaction, including: chest pain, trouble breathing or shortness of breath, swelling of your face, tongue, or throat, and feel faint or pass out.

HOW SAFE IS ULTOMIRIS IN PNH PATIENTS?

9. How safe is ULTOMIRIS in PNH patients?

- ULTOMIRIS has an established safety profile based on 4 Phase 3 clinical trials across 2 diseases, including PNH.[3] The safety profile of ULTOMIRIS in adult patients is based on results from 2 of the largest clinical trials ever conducted in PNH.[3]
- The most frequently reported side effects in people with PNH treated with ULTOMIRIS were upper respiratory infection, and fever.[3]
  - The majority of side effects with ULTOMIRIS were mild or moderate in intensity.[3]
- ULTOMIRIS is a medicine that affects your immune system and can lower the ability of your immune system to fight infections. ULTOMIRIS increases your chance of getting serious and life-threatening meningococcal infections that may quickly become life-threatening and cause death if not recognized and treated early. Your doctor will ensure you receive meningococcal vaccinations prior to treatment.[3]
- ULTOMIRIS can cause serious side effects including infusion-related reactions (lower back pain, pain with the infusion, feeling faint or discomfort in your arms or legs). Tell your doctor or nurse right away if you develop these symptoms, or any other symptoms during your ULTOMIRIS infusion. These reactions do not require discontinuation, but your doctor may slow or interrupt the infusion.[3]

ULTOMIRIS has an established safety profile based on 4 Phase 3 clinical trials across 2 diseases including PNH

10. What are the vaccination requirements for ULTOMIRIS?

- With ULTOMIRIS, you should receive meningococcal vaccines at least 2 weeks prior to your first dose of ULTOMIRIS if you have not already had this vaccine.[3]
- Your doctor will ensure you are properly vaccinated before beginning treatment.

You will receive meningococcal vaccines 2 weeks before your first dose of ULTOMIRIS

11. Is ULTOMIRIS safe for PNH patients who are pregnant or breastfeeding?

- ULTOMIRIS has not been studied in PNH patients who are pregnant or breastfeeding. Talk to your doctor about how to best manage your condition during and after pregnancy.[3]

Talk to your doctor about how to best manage your condition during and after pregnancy

HOW DOES ULTOMIRIS RELATE IN TERMS OF DOSE AND INFUSION LOGISTICS?

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12. How long are ULTOMIRIS infusions?

- Infusion time with ULTOMIRIS depends on patient body weight.[3]
- While ULTOMIRIS is infused less frequently than SOLIRIS, a greater volume needs to be infused each time.[1,3]
- However, after the starting dose, adult patients will spend 44%-56% less time in infusion and infusion-related monitoring per year with ULTOMIRIS vs SOLIRIS.[1,3]

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13. Why is ULTOMIRIS dosage based on weight?

- Weight-based dosing allows for individualized control of C5. ULTOMIRIS is dosed based on body weight in order to provide sustained control of C5 for the full 8-week treatment cycle.[3]

ULTOMIRIS is dosed based on body weight in order to provide sustained control of C5

14. Can I continue home infusions on ULTOMIRIS?

- Availability of home infusion services may depend on your insurance coverage. Your OneSource™ Support Specialist can help you determine if your insurance will cover home infusions with ULTOMIRIS.

Talk to your OneSource Support Specialist about home infusions

SELECT IMPORTANT SAFETY INFORMATION (CONT'D)

The most common side effects of ULTOMIRIS in people treated for PNH are upper respiratory tract infection and headache.

Tell your healthcare provider about any side effect that bothers you or that does not go away. These are not all the possible side effects of ULTOMIRIS. For more information, ask your healthcare provider or pharmacist. Call your healthcare provider right away if you miss an ULTOMIRIS infusion or for medical advice about side effects. You may report side effects to FDA at 1-800-FDA-1088.

15. If I want to make the transition to ULTOMIRIS, what should I do next?

- Talk to your doctor about making the transition to ULTOMIRIS. The decision to transition should be at the discretion of your treating physician, who will use his/her clinical judgment in deciding the appropriate timing for transitioning from SOLIRIS to ULTOMIRIS.
- When it's time to make the transition, your OneSource™ Support Specialist can assist you with insurance-related matters. Once you have authorization from your insurance company, your OneSource Support Specialist can also help you find an infusion center.

The decision to transition should be at the discretion of your treating physician

Your OneSource Support Specialist can assist you with insurance-related matters

16. What is the process for making the transition to ULTOMIRIS?

- If you are transitioning from SOLIRIS to ULTOMIRIS, you will receive a "starting dose" of ULTOMIRIS 2 weeks after your final SOLIRIS infusion.[3]
- After that, you will be given ULTOMIRIS once every 8 weeks, beginning 2 weeks after the ULTOMIRIS starting dose.[3] ULTOMIRIS is infused every 8 weeks for most people and every 4 weeks for children weighing less than 44 pounds (20 kilograms).

2 weeks after a starting dose, you will be given ULTOMIRIS once every 8 weeks

WHERE CAN I FIND OUT MORE?

17. Is there a way for me to connect with other patients who have made the transition to ULTOMIRIS?

- Every year, Alexion hosts webinars and events for patients to hear from leading physicians and patients like them. To learn more, and to sign up for upcoming events, please visit www.alexionpnhevents.com.

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18. Where can I go to find out more about ULTOMIRIS?

- Ask your OneSource™ Support Specialist to tell you more about ULTOMIRIS. OneSource™ has lots of additional educational resources that can help you prepare to make the transition. If you're not already enrolled in OneSource, you can sign up in 5 minutes or less by visiting www.AlexionOneSource.com and clicking "Get Started."
- In addition, you can visit the following websites:
  - **ULTOMIRIS PNH Patient Website** (www.ULTOMIRIS.com/PNH)
  - **ULTOMIRIS and SOLIRIS REMS website** (www.ultsolrems.com)
  - **Alexion PNH Webinars** (www.alexionpnhevents.com)
  - **Aplastic Anemia and MDS International Foundation (AAMDSIF)** (www.aamds.org)
  - **National Organization for Rare Disorders** (www.rarediseases.org)
  - **Global Genes Project** (www.globalgenes.org)
- Remember to speak with your doctor about how to manage PNH and ULTOMIRIS.

ONESOURCE®
Personalized Patient Support from Alexion

1.888.765.4747 • OneSource@Alexion.com

OneSource has many additional educational resources that can help you prepare to make the transition

The Alexion **OneSource** Copay Program is an Alexion-sponsored program that provides financial assistance by covering eligible commercially insured patients' out-of-pocket costs relating to medication and infusion. Additional terms and conditions apply. Please contact OneSource for additional questions.

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INDICATION & IMPORTANT SAFETY INFORMATION for ULTOMIRIS

INDICATION

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References

1. SOLIRIS Prescribing Information, Alexion Pharmaceuticals, Inc. **2.** Sheridan D et al. *PLoS One*. 2018; 13(4):e0195909. **3.** ULTOMIRIS Prescribing Information, Alexion Pharmaceuticals, Inc. **4.** Data on file. Alexion Pharmaceuticals, Inc.; 2018. **5.** Noris M et al. *Nat Rev Nephrol*. 2012;8:622-633. **6.** Rother RP et al. *JAMA*. 2005;293(13):1653-1662. **7.** Brodsky RA et al. *Haematologica*. 2020;haematol.2019.236877. **8.** Peipert J et al. *PLoS ONE*. 2020;15:e0237497. **9.** Levy AR et al. Presented at the International Society for Pharmacoeconomics and Outcomes Research (ISPOR) Europe; 2–6 November, 2019; Copenhagen, Denmark.

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