



2024 RSV GUIDE

FOR HEALTHCARE PROFESSIONALS

ABOUT RSV

Respiratory syncytial virus (RSV) is a common virus that infects the airways and lungs. It is highly contagious and spreads easily. The main treatment for RSV infection is rest and plenty of fluids.

Regular hand washing and good personal hygiene can stop RSV from spreading.^[1]

CAUSE AND TRANSMISSION

RSV generally causes a mild, cold-like illness but it can cause breathing problems and lung problems like bronchiolitis and pneumonia.

RSV is the most common cause of bronchiolitis and pneumonia in children younger than 1 year of age. Viruses (including RSV) are the most common causes of Community Acquired Pneumonia (CAP) in young children.

An infected person can transmit RSV by:^[2]

- Sneezing or coughing
- Touching a hard surface or a soft surface like the hands or a tissue

RSV can be picked up from an infected person by:

- Getting the particles from a cough or sneeze into the eyes and mouth
- Touching a surface with virus on it and then touching the face
- Having direct contact with someone with the virus by kissing their face



People with RSV are generally contagious for 3–8 days. Some infants and people with impaired immune systems may be contagious for 4 weeks after symptoms subside.



Most people recover from the infection within 10 days.^[3]

HOW IS RSV TREATED?

Most cases of RSV are mild and can be treated at home with rest and hydration.

BRONCHIOLITIS^[4]

Most children presenting to the general practitioner with bronchiolitis have mild acute bronchiolitis and can be managed in the community.

RECOMMENDED MANAGEMENT

For all children with acute bronchiolitis:

- Reassure carers
- Educate carers about minimal handling
- Advise carers to give patients small, frequent feeds

For children with moderate to severe acute bronchiolitis, provide symptomatic care in hospital, including supplemental oxygen and nasogastric feeds or intravenous fluids.

For children with severe bronchiolitis, non-invasive ventilation (e.g. CPAP), high-flow nasal cannula therapy or invasive ventilation may be required.

Community Acquired Pneumonia (CAP)^[4]

If a viral cause is suspected, treat symptoms with:

- Paracetamol or ibuprofen for fever or pain
- Fluids to achieve and maintain adequate hydration.



RSV PREVENTION

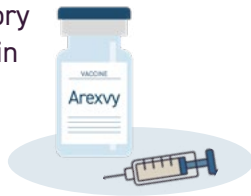
Advise patients/carers that RSV can be prevented by various hygiene measures:

- Washing hands with soap and water for at least 20 seconds
- Keeping infected people away from others, especially babies and older people
- Not sharing drinks, or cutlery with people who have colds
- Covering the nose and mouth when sneezing or coughing
- Throwing out tissues as soon as they've used them

PHARMACEUTICAL INTERVENTIONS

VACCINES

Arexvy is a recombinant respiratory syncytial virus pre-fusion F protein (adjuvanted) vaccine.



It is indicated for the active immunisation of individuals 60 years and older for the prevention of lower respiratory tract disease caused by RSV.

The vaccine is administered as a single dose of 0.5 mL for intramuscular injection only, preferably in the deltoid muscle. The need for revaccination has not been established.^[5]

Abrysvo is also a recombinant respiratory syncytial virus pre-fusion F protein vaccine formulated to actively immunise pregnant patients, particularly between 24-36 weeks of gestation, to prevent lower respiratory tract disease caused by Respiratory Syncytial Virus (RSV) in infants from birth through to 6 months of age.



It is also indicated for the active immunisation of individuals aged 60 and above to prevent RSV-caused lower respiratory tract disease.^[6]

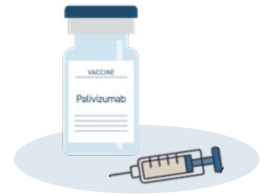
MONOCLONAL ANTIBODIES

Prevention In High-Risk Infants

High-risk infants are those that are more likely to develop complications from RSV. They include **premature infants** or those with *heart or lung problems* or those that are *immunocompromised* (have weakened immune systems).

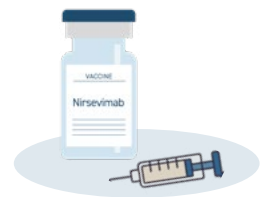
Palivizumab

Palivizumab is an injectable humanized IgG1 monoclonal antibody indicated for the prevention of serious lower respiratory tract disease caused by respiratory syncytial virus (RSV) in children at high-risk of RSV disease. It is given intramuscularly, monthly, and as required. It has been shown to reduce intensive care unit admission for babies who have been hospitalised for RSV.^{[7][8]}



Nirsevimab

Nirsevimab is an injectable, neutralising human IgG1 long-acting monoclonal antibody that protects against respiratory syncytial virus (RSV) disease for at least 5 months after a single dose.



It is indicated for the prevention of RSV lower respiratory tract disease to protect all infants against severe disease during or entering their first RSV season, and young children aged <24 months who are vulnerable to severe disease during their second RSV season.^{[9][10]}

As RSV vaccines are new to Australia, it is expected that more vaccine options will be available over the next few years, some of which hopefully will be available free of charge on the NIP.

RSV IN YOUNG CHILDREN

RSV is a very infectious virus, and most children will get it at least once before they turn 2 years of age.^[11]



During 2006–2015, there were **63,814 hospitalisations** with an RSV-specific principal diagnostic code; **60,551 (94.9%)** were of children **under 5 years** of age.^[12]

Between 2016 and 2019, there were more than **115,000 hospitalisations** with an RSV diagnosis in Australia, of which approximately **75%** were of children aged **<5 years**. Most of these children were otherwise healthy.

For infants aged **<6 months**, the annual RSV hospitalisation rate over this period was approximately **6,200 per 100,000 population**, with the highest rates in infants aged **0–2 months** (approximately **7,200 per 100,000 population**).^[13]

From RSV becoming a notifiable disease in 202–6 June 2024, there have been **314,432 cases** reported to the National Notifiable Disease Surveillance System, with **51.6%** being children **aged 4 and under**.^[14]

RSV is associated with increased morbidity amongst preterm infants and babies born with chronic health conditions such as respiratory and/or cardiac complications.^[8]

Currently, there is one TGA approved vaccine and two TGA monoclonal antibody drugs available for young infants: Abrysvo, Synagis and Beyfortus.

RSV IN ADULTS

RSV symptoms in adults and older healthy children are generally mild and mimic the common cold.



Older adults (especially those **>65 years of age**), **First Nations peoples**, people with **heart and lung disease**, or people with **weakened immune systems** are at **higher risk of complications and hospitalisation**. They may develop pneumonia, more severe symptoms of asthma, chronic obstructive pulmonary disease (COPD), or congestive heart failure.^[13]

Vaccination before the RSV season is the best defence against catching RSV. Currently, there are two TGA approved RSV vaccines available for adults 60 years and older: *Arexvy* and *Abrysvo*.

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