5.23 EVOLOCUMAB
Injection 420 mg in 3.5 mL single dose autoinjector
Repatha®, Amgen Australia Pty Ltd

1. Purpose of Application
	1. The minor submission requested PBS listing of an additional form of evolocumab 120 mg/1 mL in 3.5 mL for the treatment of familial homozygous hypercholesterolaemia.
2. Requested listing
	1. The submission sought the same restriction as the current 140 mg/mL listing.

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| **Name, Restriction,****Manner of administration and form** | **Max.****Qty** | **№.of****Rpts** | **Dispensed Price for Max. Qty** | **Proprietary Name and Manufacturer** |
| EVOLOCUMAB120 mg/ mL injection, 3.5 mL cartridge | 1 | 5 | $942.63 published price\*$'''''''''''''''' effective price | Repatha® | Amgen Australia Pty Ltd |
| \*The proposed dispensed price for the DPMQ is the same as for the existing listing as the maximum quantities of both provide for one 420 mg dose. |
| **Category /** **Program** | GENERAL – General Schedule (Code GE) |
| **Prescriber type:** | [ ] Dental [x] Medical Practitioners [ ] Nurse practitioners [ ] Optometrists[ ] Midwives |
| **Condition:** | Familial homozygous hypercholesterolaemia |
| **PBS Indication:** | Familial homozygous hypercholesterolaemia |
| **Restriction Level / Method:** | [ ] Restricted benefit[x] Authority Required - In Writing[ ] Authority Required - Telephone[ ] Authority Required – Emergency[ ] Authority Required - Electronic[ ] Streamlined |
| **Treatment phase** | Initial treatment |
| **Clinical criteria:** | The treatment must be in conjunction with dietary therapy and exercise.ANDThe condition must have been confirmed by genetic testing; ORThe condition must have been confirmed by a Dutch Lipid Clinic Network Score of at least 7.AND Patient must have an LDL cholesterol level in excess of 3.3 millimoles per litre after at least 3 months of treatment at a maximum tolerated dose of an HMG CoA reductase inhibitor (statin), in conjunction with dietary therapy and exercise; ORPatient must have an LDL cholesterol level in excess of 3.3 millimoles per litre after having developed a clinically important product-related adverse event during treatment with an HMG CoA reductase inhibitor (statin) necessitating a withdrawal of statin treatment; ORPatient must have an LDL cholesterol level in excess of 3.3 millimoles per litre and must be one in whom treatment with an HMG CoA reductase inhibitor (statin) is contraindicated. |
| **Treatment Criteria** | Must be treated by a consultant physician or in consultation with a consultant physician. |
| **Prescriber Instructions** | A clinically important product-related adverse event is defined as follows: (i) Severe myalgia (muscle symptoms without creatine kinase elevation) which is proven to be temporally associated with statin treatment; or (ii) Myositis (clinically important creatine kinase elevation, with or without muscle symptoms) demonstrated by results twice the upper limit of normal on a single reading or a rising pattern on consecutive measurements and which is unexplained by other causes; or (iii) Unexplained, persistent elevations of serum transaminases (greater than 3 times the upper limit of normal) during treatment with a statin. The date of the consultation with a consultant physician must be no more than 6 months prior to the application for a PBS authority. The full name of the consultant physician consulted and the date of consultation are to be provided at the time of application.The qualifying LDL cholesterol level prior to initiation of treatment with this drug must be provided at the time of application. With the exception of patients contraindicated to a statin, the agent, dose and duration of statin treatment must be provided at the time of application.The authority application must be made in writing and must include:a) A completed authority prescription form; andb) A completed Familial homozygous hypercholesterolaemia Initial PBS Authority Application - Supporting Information Form; andc) The date of consultation and the full name of the consultant physician; andd) A copy of the qualifying Dutch Lipid Clinic Network Score or a copy of the result of genetic testing; ande) The result of LDL cholesterol level and one of the following where appropriate: statin treatment details including agent, dose and treatment duration; or details of adverse event or contraindication to treatment with a statin as defined in the TGA-approved Product Information. |
| **Administrative Advice** | Any queries concerning the arrangements to prescribe may be directed to the Department of Human Services on 1800 700 270 (hours of operation 8 a.m. to 5 p.m. EST Monday to Friday). Prescribing information (including Authority Application forms and other relevant documentation as applicable) is available on the Department of Human Services website at www.humanservices.gov.auApplications for authority to prescribe should be forwarded to: Department of Human ServicesComplex Drugs Reply Paid 9826 HOBART TAS 7001No increase in the maximum number of repeats may be authorisedSpecial Pricing Arrangements apply. |

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| **Treatment Phase** | Continuing Treatment |
| **Clinical criteria:** | Patient must have previously received PBS-subsidised treatment with this drug for this condition.ANDThe treatment must be in conjunction with dietary therapy and exercise. |
| **Administrative Advice** | Authority applications for continuing treatment may be made by telephone to the Department of Human Services on 1800 700 270 (hours of operation 8 a.m. to 5 p.m. EST Monday to Friday). |

1. Background
	1. Evolocumab was approved by the TGA on 4 December 2015 for the treatment of:
* Adults with heterozygous familial hypercholesterolaemia (HeFH) or clinical atherosclerotic cardiovascular disease (CVD):
	+ in combination with a statin or statin with other lipid lowering therapies,
	+ in combination with other lipid-lowering therapies in patients who are statin-intolerant.
* Homozygous familial hypercholesterolaemia (HoFH)
	+ in combination with other lipid lowering therapies in adults and adolescents aged 12 years and over.
* The new requested strength 420 mg/ 3.5 mL injection cartridge (120 mg/mL), was registered on the ARTG on 27 March 2017.
	1. The PBAC recommended PBS listing of evolocumab for homozygous familial hypercholesterolaemia at the March 2016 meeting. The current listed strength is 140 mg/mL injection, 1 x 1 mL pre-filled injection pen.
1. Clinical place for the proposed therapy
	1. Hypercholesterolaemia is a condition characterised by elevated serum cholesterol levels and is associated with the development of atherosclerosis and an increased incidence of angina, myocardial infarction, stroke, coronary artery disease and peripheral vascular disease.
2. Consideration of the evidence

## Sponsor hearing

* 1. There was no hearing for this item as it was a minor submission.

## Consumer comments

* 1. The PBAC noted that no consumer comments were received for this item.

## Clinical trials

* 1. The minor submission presented a summary of the two clinical trials that were used to support registration of the new 420 mg/3.5 mL form with the TGA. These were a phase I pharmacokinetic study and a phase III home-use study.
	2. The TGA approval of the Automated Mini-Doser (AMD) presentation consisted of a pre-filled cartridge containing 3.5 mL of 120 mg/mL evolocumab (420 mg) co-packaged with the AMD. The initial recommended dose for evolocumab is 420 mg once monthly. The dose can be increased to 420 mg every two weeks if a clinically meaningful response is not achieved in 12 weeks.

## Economic analysis

* 1. As a minor submission, an economic comparison was not presented.

## Estimated PBS usage & financial implications

* 1. The minor submission estimated there to be no financial cost to the PBS from listing the new form as the proposed price of the 420 mg/3.5 mL cartridge is the same as the three 140 mg/mL pens currently listed on the PBS. The new 420 mg strength will be delivered as a single injection as an alternative to three injections with the existing 140 mg/mL pen.
1. PBAC Outcome
	1. The PBAC recommended the listing of the new strength of evolocumab for the treatment of familial homozygous hypercholestrolaemia as the listing would reduce the number of injections that patients would be required to administer from the three injections for the currently listed strength of 140 mg/mL to a single injection and therefore would make it easier for patients to manage their condition.
	2. The PBAC accepted the additional form of evolocumab will provide patients with an alternative dosing schedule at no additional cost to the Government.
	3. The PBAC noted the restriction is unchanged from the currently listed strength of evolocumab.
	4. The PBAC advised that evolocumab is not suitable for prescribing by nurse practitioners.
	5. The PBAC recommended that the Early Supply Rule should apply.
	6. The PBAC noted that this submission is not eligible for an Independent Review as it received a positive recommendation.

**Outcome:**

Recommended

1. Recommended listing
	1. Add new item

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1. Context for Decision

The PBAC helps decide whether and, if so, how medicines should be subsidised in Australia. It considers submissions in this context. A PBAC decision not to recommend listing or not to recommend changing a listing does not represent a final PBAC view about the merits of the medicine. A company can resubmit to the PBAC or seek independent review of the PBAC decision.

1. Sponsor’s Comment

Amgen is pleased that an alternative presentation of evolocumab will be available on the PBS.