



EV FACT SHEET

BMW i4

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Image: BMW USA

INTRODUCTION

The BMW i4 is one of three new full-electric vehicles that were released by BMW in 2021. Classed in Australia as a medium size passenger car, it is marketed as a five door coupe and features a large liftback style rear boot opening and seating for five people. Like all electric BMWs, the model name begins with a lowercase 'i' to differentiate it from fossil fuelled BMWs.

Built in Germany, the i4 shares a platform used to build ICE (internal combustion engine), hybrid and plug-in hybrid models. The i4 is available in rear-wheel drive (eDrive35) or all-wheel drive (eDrive40 and M50) versions. Its direct competitors in Australia would include the Polestar 2 and Tesla Model 3.

The i4 offers up to 11 kW AC charging and 205 kW maximum DC fast-charge rate. At that DC rate, it can recharge 100 km of range in just under 6 minutes.

DRIVING RANGE

Australian test standards are currently in a state of flux, with the Green Vehicle Guide² showing some vehicle driving ranges using either the old (and highly over optimistic) European NEDC test cycle figure or the newer European WLTP test cycle figure. Worse still, for recent additions to the Australian market the GVG often gives no data at all! Around town, the WLTP figure is the best guide to range or, if doing outer suburban to regional driving – use the US EPA figure.

DRIVING RANGE (CONTINUED)

Testing system range estimates:			
Variant	NEDC (Aust)	WLTP (Euro)	EPA (USA)
2WD (eDrive35)	Unavailable	Unavailable	NA
AWD (eDrive40)	Unavailable	Unavailable	484
AWD (M50)	Unavailable	Unavailable	433

Table 1: Driving range estimates for BMW i4

Using the US EPA range – an i4 eDrive40 should be capable of a return trip from the Melbourne GPO to Stawell in Victoria's central-west, provided the heating or air conditioning were not heavily used.

If done as a day-trip, it would be useful to do either a ½ - 1 hour top-up charge at an AC charger or 5 to 10 min at a DCFC (DC fast-charger) at one of the expanding number of AC and DCFC sites along this route. For further charging options and availability, see:

<https://www.plugshare.com/>

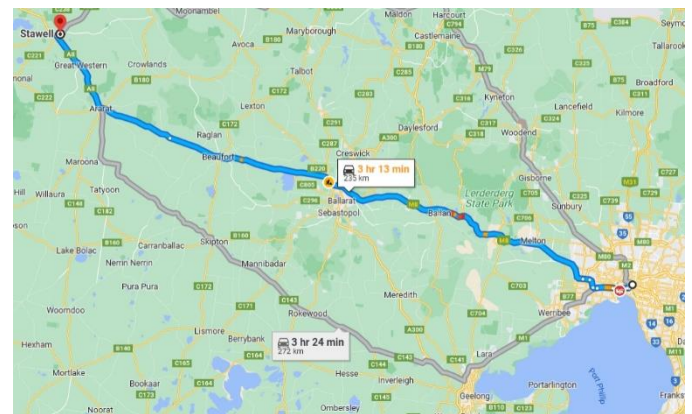


Image: Google maps

CHARGING SPEEDS/REQUIREMENTS

Charging port

The i4 is fitted with a CCS2 socket allowing it to charge via Type 2 AC chargers² as well as CCS2 DC fast-chargers.



CCS2 charging plug and socket

Notes:

- <https://www.greenvehicleguide.gov.au>
- The i4 can be charged at any AC EVSE, however an adaptor will be needed to use the (few) remaining older EVSEs fitted with Type 1 (J1772) plugs. It will also only charge at a maximum of 7.4 kW on a Type 1 plug EVSE.

CHARGING SPEEDS/REQUIREMENTS (CONTINUED)

AC charging:

Like all new EVs sold in Australia, the BMW i4 is fitted with a type 2 AC socket.

Charging rates:

Single phase: maximum of 7.4kW (32A)

Three phase: 11kW (16A per phase)

Charging speeds and times vary on the capacity of the EVSE (Electric Vehicle Supply Equipment) it is connected to and the chosen battery size. Approximate charging times for the i4 are shown in table 2 below.

AC: 0 – 100% time				DC: 0 – 80% time	
10 A (power point)	15 A 1 phase (Caravan outlet)	32 A (1 ph. Home EVSE)	16 or 32 A (3 phase public AC EVSE)	DC Fast charge (50kW)	DC Fast charge (200+kW)
70 kWh: 40h*	20h	10h	16A: 6.7h 32A: 6.7h	70m	30m
84 kWh: 46h*	24.5h	11.5h	16A: 7.6h 32A: 7.6h	90m	35m

Table 2: Approximate charging times for the BMW i4 battery sizes.

* Using BMW supplied 1.8kW max portable charging cable. Would reduce to around 30h and 35h respectively if a 2.4kW portable charger is used.

DC fast charging:

Like all new BEVs sold in Australia (except the aging Nissan Leaf and Lexus UX300e), the i4 uses the CCS2 DC fast-charge connector and can charge at up to 205kW for the 84kWh battery and 180kW for the 70kWh battery.

V2X capability:

The BMW i4 does not offer any V2X functionality.

Notes:

V2X is the generic term covering the options of getting 230V AC power from the battery and supplying it as:

- V2L: vehicle to load (230V power available from outlet in car)
- V2H: vehicle to home (supply home via special connection)
- V2G: vehicle to grid (supply home or grid via spec. connection)

HOME CHARGING CONSIDERATIONS

General

To get the shortest home charging time for a BMW i4, an 11 kW (3 phase) would be needed.

However, depending on your existing power supply and/or charging needs, it may only be practicable to fit a lower rated EVSE. (See notes below). Lower capacity EVSEs will increase charging times, as shown in table 2.

Important notes for any home EVSE installation:

1. High charging rates are generally not needed for overnight charging.
2. Homes do not normally have three phase AC connected.
3. Switchboard and/or electrical supply upgrades may be needed if your home is more than 20 years old. For more information on this item – see Fact Sheets at EVchoice.com.au or read articles in:
 - (a) Renew magazine edition 143. (EVSE wiring)
 - (b) Renew magazine edition 156. (EVSE buyer's guide)

SPECIFICATIONS

Seating: 5

Boot volumes in litres: (1 litre = 10 x 10 x 10 cm)

- Boot - seats up: 470 L
- Boot - seat folded/to roof: 1,290 L
- Froot (front boot): NA

Dimensions:

- Overall length: 4,783 mm
- Overall height: 1,448 mm
- Ground clearance: 125 mm
- Overall width (edge of doors): 1,852 mm
- Overall width (edge of mirrors): 2,073mm

Battery:

- eDrive35: 70.2 kWh (67 useable)
- eDrive40 & M50: 83.9 kWh (81.1 useable)

Energy consumption: (WLTP test cycle)

- eDrive35: Unavailable
- eDrive40: TBC Unavailable
- M50: TBC Unavailable

Kerb weight:

- eDrive35: 2,065 kg
- eDrive40: 2,125 kg
- M50: 2,290 kg

Charging:

- 1 phase AC: 7.4 kW max.
- 3 phase AC: 11 kW max.
- DC: 180 kW (eDrive35)
- DC: 205 kW (eDrive40 & M50)

Charge port location:

- RHS, rear (just behind the rear driver's side door)

Drive configuration:

- eDrive35: 2WD, rear wheels driven
- eDrive40 & M50: AWD

Towing:

- 750/1,600 kg (unbraked/braked)

Performance:

Version	Max. Power (kW)	Max. torque (Nm)	0-100km/h (Sec)
eDrive35	210	400	6.0
eDrive40	250	430	5.7
M50	400	795	3.9

Spare tyre: No

IMPORTANT NOTE

Always check all specifications with the manufacturer prior to any purchase. No responsibility accepted by AEVA or Bryce Gatton (EVchoice) for errors factual or due to reproduction in this Fact Sheet. Whilst all efforts are made to ensure the accuracy of the material in this Fact Sheet, manufacturers regularly make changes (often unannounced) to their model ranges and specifications.