BD PhaSeal™ System
Product Catalog
BD PhaSeal is a clinically proven closed-system drug transfer device that prevents hazardous drug exposure.

This product catalog contains information regarding the different components of the BD PhaSeal system. Whether you are to prepare a drug for administration by infusion or by injection, the BD PhaSeal system offers the range of products to meet your safe handling requirements.

Product overview

<table>
<thead>
<tr>
<th>Preparation</th>
<th>Administration</th>
<th>Administration</th>
</tr>
</thead>
<tbody>
<tr>
<td>Vial to Syringe</td>
<td>IV bag access</td>
<td>IV line access</td>
</tr>
<tr>
<td>Options depending on drug dose volume and/or vial necksize</td>
<td>Options depending on type of administration</td>
<td>Options depending on type of administration</td>
</tr>
</tbody>
</table>

The product range may vary between different markets.
Contents

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The Protector is a pressure equalization device which is permanently attached to the vial. It is used in the preparation of drugs from either powder or liquid form.

The Protector establishes and maintains neutral pressure when air or fluid is injected into or aspirated from the vial.

Material specifications, see page 11.
Drug vial access device – BD PhaSeal Protector

**Protector (P14)**
REF 515100
Vial adapter for closed reconstitution and pressure equalization. For drug vials with neck Ø13 mm. When attached to a vial, Protector (P14) has an equalizing capacity of 20 mL of air.

<table>
<thead>
<tr>
<th>PACKAGING</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>User box</td>
<td>50 pcs</td>
</tr>
<tr>
<td>Transport box</td>
<td>200 pcs</td>
</tr>
</tbody>
</table>

**Protector (P21)**
REF 515102
Vial adapter for closed reconstitution and pressure equalization. For drug vials with neck Ø20 mm. When attached to a vial, Protector (P21) has an equalizing capacity of 20 mL of air.

<table>
<thead>
<tr>
<th>PACKAGING</th>
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</tr>
</thead>
<tbody>
<tr>
<td>User box</td>
<td>50 pcs</td>
</tr>
<tr>
<td>Transport box</td>
<td>200 pcs</td>
</tr>
</tbody>
</table>

**Protector (P28)**
REF 515104
Vial adapter for closed reconstitution and pressure equalization. For drug vials with neck Ø28 mm. When attached to a vial, Protector (P28) has an equalizing capacity of 60 mL of air.

<table>
<thead>
<tr>
<th>PACKAGING</th>
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</tr>
</thead>
<tbody>
<tr>
<td>User box</td>
<td>25 pcs</td>
</tr>
<tr>
<td>Transport box</td>
<td>100 pcs</td>
</tr>
</tbody>
</table>

**Protector (P50)**
REF 515105
Vial adapter for closed reconstitution and pressure equalization. For drug vials with neck Ø20 mm. When attached to a vial, Protector (P50) has an equalizing capacity of 50 mL of air.

<table>
<thead>
<tr>
<th>PACKAGING</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>User box</td>
<td>25 pcs</td>
</tr>
<tr>
<td>Transport box</td>
<td>100 pcs</td>
</tr>
</tbody>
</table>
BD PhaSeal™ Injector

The Injector ensures a closed transfer of the drug by means of double, elastomeric membranes.

*Material specifications, see page 11.*

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BD PhaSeal™ Administration products

IV line access

BD PhaSeal administration products ensure closed transfer to infusion bags and closed administration of the drug via the patient’s IV line.

*Material specifications, see page 11.*
Syringe safety device – BD PhaSeal Injector

**Injector Luer Lock (N35)**
**REF 515003**
Transfer device that attaches to a disposable syringe or IV tubing with a standard Luer Lock connection.

<table>
<thead>
<tr>
<th>PACKAGING</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>User box</td>
<td>50 pcs</td>
</tr>
<tr>
<td>Transport box</td>
<td>200 pcs</td>
</tr>
</tbody>
</table>

**Connector Luer Lock (C35)**
**REF 515200**
Attaches to the patient’s IV line, providing a closed connection to the Injector. Standard Luer Lock connection.

<table>
<thead>
<tr>
<th>PACKAGING</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>User box</td>
<td>50 pcs</td>
</tr>
<tr>
<td>Transport box</td>
<td>200 pcs</td>
</tr>
</tbody>
</table>

**Connector Luer Lock (C45)**
**REF 515202**
Attaches to the patient’s IV line, providing a closed connection to the Injector. Standard Luer Lock connection. This Connector is designed for use with needle-free ports with internal pistons.

<table>
<thead>
<tr>
<th>PACKAGING</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>User box</td>
<td>50 pcs</td>
</tr>
<tr>
<td>Transport box</td>
<td>200 pcs</td>
</tr>
</tbody>
</table>

**Y-site Connector (C80)**
**REF 515304**
Extension tubing with in-built BD PhaSeal Connector.
Total length: 21 cm.
Priming volume: 1.6 mL.

<table>
<thead>
<tr>
<th>PACKAGING</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>User box</td>
<td>30 pcs</td>
</tr>
<tr>
<td>Transport box</td>
<td>120 pcs</td>
</tr>
</tbody>
</table>
BD PhaSeal™ Administration products
IV bag access

Material specifications, see page 11.
**Secondary Set, Drip Chamber (C60)**

**REF 515301**

Secondary set with in-built BD PhaSeal Connector for closed transfer to IV bag.

- Total length: 102 cm.
- Priming volume: 12.5 mL.
- Drops/mL: 20.

**PACKAGING**

| User box | 20 pcs |
| Transport box | 80 pcs |

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**Infusion Adapter (C100)**

**REF 515306**

Connection between IV bag and non vented infusion set. In-built BD PhaSeal Connector for closed transfer to IV bag. PVC-free.

**PACKAGING**

| User box | 50 pcs |
| Transport box | 200 pcs |
**Product Catalog for Canada and United States**

**BD PhaSeal System components**

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**Assembly Fixture (M12)**  
REF 515400  
Mechanical device used for consistent and simple attachment of a Protector to a drug vial. Non-sterile.

<table>
<thead>
<tr>
<th>PACKAGING</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Transport box</td>
<td>1 pc</td>
</tr>
</tbody>
</table>

**Syringe Tray (M15)**  
REF 515401  
The Syringe Tray is used to transport the filled syringe to the administration area. Designed to accommodate 1–30 mL syringes with Injector Luer Lock (N35). Non-sterile.

<table>
<thead>
<tr>
<th>PACKAGING</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Transport box</td>
<td>120 pcs</td>
</tr>
</tbody>
</table>

**Infusion Clamp (M25)**  
REF 515403  
Clamp for securing the connection of Injector Luer Lock (N35) to the Connector. Non-sterile.

<table>
<thead>
<tr>
<th>PACKAGING</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>User box</td>
<td>25 pcs</td>
</tr>
<tr>
<td>Transport box</td>
<td>100 pcs</td>
</tr>
</tbody>
</table>

**Cap for Injector membrane (M50)**  
REF 515404  
Protects membrane on Injector from direct contact with contaminated surfaces during transport and storage.

<table>
<thead>
<tr>
<th>PACKAGING</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>User box</td>
<td>50 pcs</td>
</tr>
<tr>
<td>Transport box</td>
<td>200 pcs</td>
</tr>
</tbody>
</table>

**Hanger for IV-bag (M55)**  
REF 515405

<table>
<thead>
<tr>
<th>PACKAGING</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>User box</td>
<td>40 pcs</td>
</tr>
<tr>
<td>Transport box</td>
<td>160 pcs</td>
</tr>
</tbody>
</table>

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**BD PhaSeal Application products**

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### Material specification

#### BD PhaSeal Protector (P14/ P21/ P28/ P50)
**Protector | REF 515100/ 515102/ 515104/ 515105**

<table>
<thead>
<tr>
<th>COMPONENTS</th>
<th>MATERIAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Expansion film</td>
<td>PA/PP</td>
</tr>
<tr>
<td>Hydrophobic filter</td>
<td>PTFE</td>
</tr>
<tr>
<td>Filter cover</td>
<td>PP</td>
</tr>
<tr>
<td>Membrane</td>
<td>TPE</td>
</tr>
<tr>
<td>Housing</td>
<td>PP</td>
</tr>
<tr>
<td>Cannula (P14, P21, P50)</td>
<td>Stainless steel</td>
</tr>
<tr>
<td>Protective lid (P14, P21, P50)</td>
<td>PE</td>
</tr>
<tr>
<td>Protective lid (P28)</td>
<td>PP</td>
</tr>
</tbody>
</table>

#### BD PhaSeal Injector (N35)
**Injector Luer Lock | REF 515003**

<table>
<thead>
<tr>
<th>COMPONENTS</th>
<th>MATERIAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cannula</td>
<td>Stainless steel</td>
</tr>
<tr>
<td>Cylinder</td>
<td>ABS</td>
</tr>
<tr>
<td>Membrane</td>
<td>TPE</td>
</tr>
<tr>
<td>Piston/Cannula housing</td>
<td>PP</td>
</tr>
<tr>
<td>Safety sleeve</td>
<td>POM</td>
</tr>
<tr>
<td>Piston sealing</td>
<td>Silicone</td>
</tr>
</tbody>
</table>

#### BD PhaSeal Administration products
**Connector Luer Lock (C35/ C45) | REF 515200/ 515202**

<table>
<thead>
<tr>
<th>COMPONENTS</th>
<th>MATERIAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Housing</td>
<td>PP</td>
</tr>
<tr>
<td>Membrane</td>
<td>TPE</td>
</tr>
<tr>
<td>Protective cap</td>
<td>PE</td>
</tr>
</tbody>
</table>

**Secondary Set, Drip Chamber (C60) | REF 515301**

<table>
<thead>
<tr>
<th>COMPONENTS</th>
<th>MATERIAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Protective cap (spike)</td>
<td>PE</td>
</tr>
<tr>
<td>Spike</td>
<td>ABS</td>
</tr>
<tr>
<td>Connector</td>
<td>ABS</td>
</tr>
<tr>
<td>Membrane</td>
<td>TPE</td>
</tr>
<tr>
<td>Drip chamber</td>
<td>PVC (DEHP-free)</td>
</tr>
<tr>
<td>Tubing</td>
<td>PVC (DEHP-free)</td>
</tr>
<tr>
<td>Roller clamp</td>
<td>ABS</td>
</tr>
<tr>
<td>Male Luer Lock</td>
<td>ABS</td>
</tr>
<tr>
<td>Protective cap with Flow Stop</td>
<td>PE</td>
</tr>
</tbody>
</table>

**Y-Site Connector (C80) | REF 515304**

<table>
<thead>
<tr>
<th>COMPONENTS</th>
<th>MATERIAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Protective cap, female Luer Lock</td>
<td>ABS</td>
</tr>
<tr>
<td>Female Luer Lock</td>
<td>ABS</td>
</tr>
<tr>
<td>Tubing</td>
<td>PVC (DEHP-free)</td>
</tr>
<tr>
<td>Slide clamp</td>
<td>PP</td>
</tr>
<tr>
<td>Connector housing</td>
<td>ABS</td>
</tr>
<tr>
<td>Membrane</td>
<td>TPE</td>
</tr>
<tr>
<td>Y-Site</td>
<td>ABS</td>
</tr>
<tr>
<td>Rotating collar</td>
<td>ABS</td>
</tr>
<tr>
<td>Male Luer Lock</td>
<td>ABS</td>
</tr>
<tr>
<td>Protective cap with Flow Stop</td>
<td>PE</td>
</tr>
</tbody>
</table>

**Infusion Adapter (C100) | REF 515306**

<table>
<thead>
<tr>
<th>COMPONENTS</th>
<th>MATERIAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Protective cap</td>
<td>PP</td>
</tr>
<tr>
<td>Spike housing</td>
<td>PP</td>
</tr>
<tr>
<td>Membrane</td>
<td>TPE</td>
</tr>
<tr>
<td>Spike port</td>
<td>TPE</td>
</tr>
</tbody>
</table>

### Key to symbols
- **STERILIZED:** Sterilised using ethylene oxide
- **X:** Do not re-use
- **latex free:** Latex-free
- **DEHP free:** DEHP-free
- **X:** BPA-free

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**ABS** Acrylo-nitrile butadiene styrene copolymer

**DEHP** Di-(2-ethylhexyl) phthalate

**PA** Polyamide

**PE** Polyethylene

**POM** Polyoxymethylene

**PP** Polypropylene

**PVC** Polyvinyl chloride

**PTFE** Polytetrafluoroethylene

**SEBS** Styrene-ethylene-butylstyrene

**TPE** Thermoplastic elastomer