

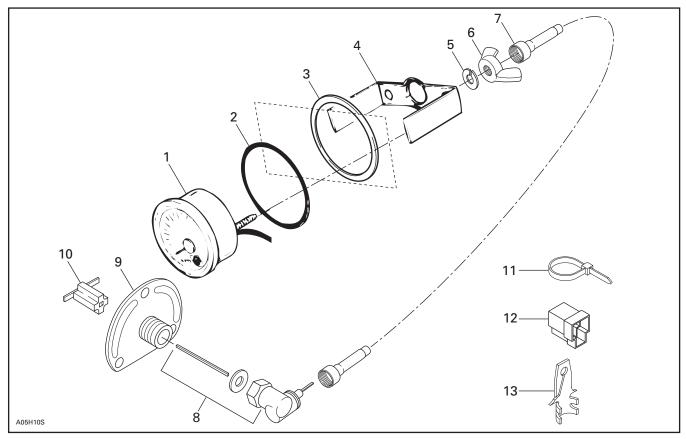
SPEEDOMETER KIT (P/N 861 505 400)

### \land WARNING

For safety reasons, this kit must be installed by an authorized Bombardier snowmobile dealer. Should removal of a locking device (e.g. lock tabs, self-locking fasteners, etc.) be required when undergoing disassembly/assembly, always replace with a new one. This instruction sheet should be given to the purchaser. This kit is designed for specific applicable models only. It is not recommended for units other than those for which it was sold.

**NOTE:** Installation time is approximately **0.5** hour.

### PARTS TO BE INSTALLED



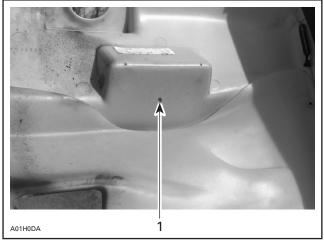
- 1. Speedometer
- 2. Gauge Packing
- 3. Ring
- 4. Gauge Holder
- 5. Lock Washer M5 (2)
- 6. Wing Nut M5 (2)
- 7. Speedometer Cable
- 8. Angle Drive

- 9. End Bearing Housing
- 10. Drive Insert
- 11. Tie Rap (4)
- 12. 2-Connector Housing
- 13. Connector (2)
- 14. Reset Button (assembly) (not shown)
- 15. Clip (not shown)

# DASHBOARD PREPARATION

#### Lift hood.

Locate center mark as shown in the following illustration.



VIEW FROM INSIDE HOOD 1. Center mark

From inside hood, position an 80 mm (3-1/8 in) hole saw over center mark.

Drill hole through dash.

### SPEEDOMETER INSTALLATION

Install male connectors no. 13 on gauge wires and position in 2-connector housing no. 12.

Ensure that the gauge wires correspond to vehicle wires as per the following table.

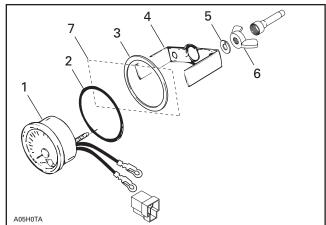
| GAUGE HARNESS | VEHICLE HARNESS |  |
|---------------|-----------------|--|
| YELLOW/BLACK  | YELLOW/BLACK    |  |
| YELLOW        | RED/YELLOW      |  |

Install gauge packing no. 2 onto speedometer no. 1.

From outside hood, install speedometer into dashboard hole.

From inside hood, install ring no. 3 then gauge holder no. 4.

Secure assembly with lock washers no. 5 and wing nuts no. 6.



Speedometer

- Gauge packing Ring
- 2. 3. 4.
- Gauge holder Lock washer Wing nut
- +. 5. 6. 7.
- Dashboard

Cut locking tie retaining vehicle connector housings to headlamp screw.

Connect housings.

Secure wires with locking tie no. 11, at headlamp screw location

### ANGLE DRIVE AND **END BEARING HOUSING** INSTALLATION

Remove muffler.

Release track tension.

To ease end bearing housing installation no. 9, support drive axle with drive axle holder (P/N 529 007 200).

Remove existing end bearing housing on the right side of frame and discard it.

**NOTE:** There may be a washer(s) inside existing end bearing housing. If so, keep washer(s) for new end bearing installation.

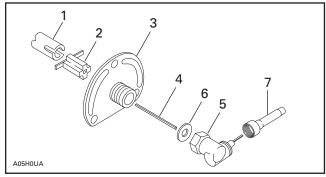
Using a fiber hammer, tap drive insert no. 10 into drive axle hole.

Install the new end bearing housing. Torque screws to 10 N•m (89 lbf•in).

Push cable branch key into speedometer drive insert.

Install washer (included with angle drive) and screw angle drive unit no. 8 onto end bearing housing.

NOTE: Position angle drive downward so that speedometer cable no. 7 will lean on bottom pan.



#### **TYPICAL**

- 1. Drive axle end
- 2. Drive insert
- End bearing housing
  Cable branch key (included with angle drive) 5 Angle drive
- Washer (included with angle drive) 6.
- Speedometer cable

### SPEEDOMETER CABLE AND WIRING HARNESS ROUTING

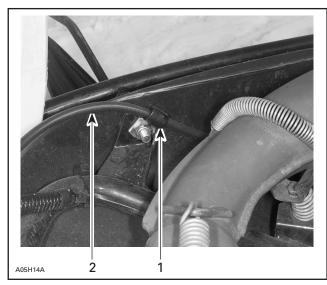
Install speedometer cable end to angle drive.

Route speedometer cable from underneath right side cross member.

Install the other speedometer cable end to the speedometer.

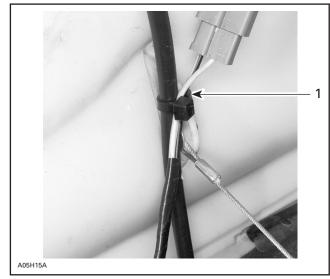
Reinstall muffler.

Secure speedometer cable with clip **no. 15** using bumper left front screw, as shown in the following photo.



- Clip 1
- Speedometer cable 2.

Drill a 6 mm (1/4 in) hole in hood retaining wire tab, then attach wiring harness and speedometer cable with locking tie no. 11, as shown in the following photo.

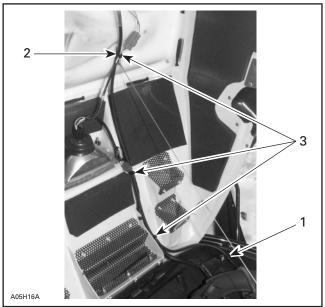


1. Drill a 6 mm (1/4 in) hole to hold locking tie

Attach wiring harness using remaining locking ties.

Refer to the following illustration for locking ties and clip location.

**CAUTION:** Carefully check speedometer and throttle cable routing to avoid contact with muffler while closing hood.

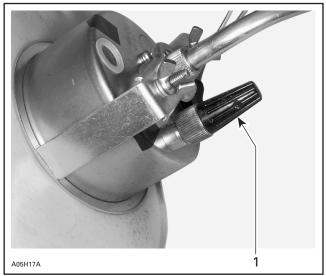


Clip 1.

- Drill a 6 mm (1/4 in) hole
- 2. 3. Locking ties location

## **RESET BUTTON**

From inside hood, install reset button **no. 14** onto speedometer, as shown in the following photo.



VIEW FROM INSIDE HOOD 1. Reset button

# TRACK TENSION

Readjust track tension previously released, as described in section ANGLE DRIVE AND END BEAR-ING HOUSING INSTALLATION.

To adjust track tension, refer to *Shop Manual Volume 1*, page 06-05-2.

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| -   |             |                                     |   |
|-----|-------------|-------------------------------------|---|
| 1.  | 414 682 000 | Speedometer                         | Indicateur de vitesse                               |
| 2.  | 414 187 200 | Gauge Packing                       | Joint torique                                       |
| 3.  | 414 187 300 | Ring                                | Anneau  |
| 4.  | 414 187 400 | Gauge Holder                        | Support d'indicateur                                |
| 5.  | 399 802 300 | Lock Washer M5 (2)                  | Rondelle-frein M5 (2)                               |
| 6.  | 414 070 300 | Wing Nut M5 (2)                     | Écrou papillon M5 (2)                               |
| 7.  | 414 516 500 | Speedometer Cable                   | Câble d'indicateur de vitesse                       |
| 8.  | 414 143 700 | Angle Drive                         | Commande angulaire                                  |
| 9.  | 501 023 900 | End Bearing Housing                 | Logement de palier d'extrémité                      |
| 10. | 572 010 100 | Drive Insert                        | Prise d'indicateur de vitesse                       |
| 11. | 414 115 200 | Locking Tie (4)                     | Attache (4)   |
| 12. | 409 204 500 | 2-Connector Housing                 | Logement à 2 raccords                               |
| 13. | 561 503 400 | Connector (2)                       | Raccord mâle (2)                                    |
| 14. | 414 487 700 | Reset Button (assembly) (not shown) | Bouton de remise à zéro (complet)<br>(non illustré) |
| 15. | 414 176 000 | Clip (not shown)                    | Pince (non illustré)                                |