# SVC-820

## Assembly Instruction



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#### **SVC-820** ASSEMBLY INSTRUCTION

#### List of items

- Robust cart wheel x4
- Front end of the cart x1
- Antenna holder pipes x2
- Back end of the cart with a mounted encoder x1
- Top end of the cart with the computer mounting hitch ball attached x1
- Quick release axle bolts x4
- Quick release secure bolts x6
- Quick snap clip and the computer holder plate
- Antenna thumb screws x8
- Radar control unit thumb screws x8



#### SVC-820 Cart Assembly

1. Insert the antenna holder pipes into the slots on the front end of the cart until the secure nobs pop into place.



2. Use the assembled piece from the previous step and connect it to the back end of the cart. Push simultaneously the antenna holder pipes into the slots on the back end of the cart and the back end pipes into the T junction slots.



3. Insert the quick release bolts with the red button into the holes to secure the connections.



4. Insert the top end of the cart into the T junction slot and secure it with the quick release bolts with the red button.



5. Find the wheel with the encoding ring on it and insert it into the socket where the encoder is located. Insert the rest of the wheels afterwards.



6. Place the quick snap clip on the cart hitch ball. Place the computer holder plate on the other side of the quick snap clip and tighten it securely. Depending on the type of the computer delivered with your GPR system you will find the adequate plate holder for it.

After the cart assembly, please follow the instructions for GPR system assembly and GPS unit assembly.





### System Assembly

1. Place the antenna under the cart.

Make sure to always place the front side of the antenna to face the front side of the cart.

2. Fasten the front and back belts to the front and back axles.



3. Fasten the side belts to the antenna holders.



4. Place the computer delivered with the GPR system into the computer plate holder. Make sure that the spring latch mechanism has a good grip on the computer and that the quick snap clip is tightened enough to hold the computer when mounted.



5. Hold the control unit with one hand and insert the fixing thumb screws from behind the horizontal bars. Continue with the rest of the thumb screws until the control unit is secured in place.



6. Put the battery pack on the back axle and fasten the two belts around the back axle and the horizontal bar as shown in the picture.



7. Connect the main control cable to the antenna using the green metal connector side of the cable.



8. Connect the other end of the control cable from step 7 to the control unit.



9. Connect the supplied survey wheel cable to the encoder



10. Connect the other end of the survey wheel cable from step 9 to the radar control unit.

The survey wheel cable connecting the encoder to the survey wheel connector on the antenna is an optional item and can be purchased separately if needed.



11. Connect the power cable to the control unit and secure it with the lock.



12. Connect the USB communication cable to the control unit and to the computer.





#### Bluetooth GPS Unit Mounting Instructions

After successful assembly of the survey cart and mounting the radar system onto the cart we can mount the GPS unit to the cart as well. The GPS unit comes together with a holder, both of them have velcro attached on their bodies.

The GPS unit is optional and can be purchased separately. We provide support only for the bluetooth GPS units delivered by Geoscanners AB with the GPR system purchase. If you own other GPS units, contact us for the possibility to provide you with a custom made solution fitted to our carts.

- 1. Take the GPS unit holder and attach it by pressing it down to the middle of the top cross bar in the front of the cart. We suggest keeping the GPS unit in this position. In this position the GPS unit is safe from being struck by some surface obstacle (vegetation, rocks) and it is safe from the possible interference from the GPR operator (for example: placing a hand over the GPS unit).
- 2. Attach the GPS unit using the velcro on the GPS unit holder.







#### **WARNING:**

Never try to mount the GPS unit onto the cart while placed on the holder. Applying force necessary to attach the GPS unit holder to the cart can break the plastic casing of the GPS unit.

