



Parts List

| Item | Quantity |
|--------------------------------|----------|
| A. Motor Mount/Swing Arm | 1 |
| B. Front Swing Arm Mount Plate | 1 |
| C. Fuel Line | 1 |
| D. Choke & Throttle Cable | 1 |
| E. Drive Belt | 1 |
| F. Drive Clutch | 1 |
| G. Header | 1 |
| H. Rubber Motor Mount | 1 |
| I. Bolt Kit | 1 |

Bolt Breakdown

| Item | Quantity | Used For |
|---|----------|--|
| ½ x 3 ½ | 1 | Rubber Motor Mount |
| 3/8 x 1 | 4 | Rubber Motor Mount/Front Swing Arm Mount |
| 3/8 x 2 ½ | 2 | Front Swing Arm Mount |
| 7/16 x 2 | 4 | To Bolt Motor To Motor Mount |
| ¹⁄4 x 1 | 2 | Mount CDI Box |
| ½ x 1 ½ | 4 | Motor Mount |
| 1 1/4 " Spacer | 1 | Mounting Drive Clutch |
| ½ Lock Nut | 1 | Rubber Motor Mount |
| ¹ / ₄ " Locknut | 2 | Mount CDI Box |
| 3/8" Locknut | 6 | Rubber Motor Mount/Front Swing Arm Mount |
| 7/16" locknut | 4 | To Bolt Motor To Motor Mount |
| 9/16" Locknut Fine Thread | 1 | Choke Mount |
| 9/16" Washer | 1 | Choke Mount |
| ¹ / ₄ " Key Way | 1 | Clutch Mount |
| ¹ / ₄ Washer | 4 | Mount CDI Box |
| 3/8 "Washer | 18 | Rubber Motor Mount/Front Swing Arm Mount |
| ½" Washer | 6 | Motor Mount/Rubber Motor Mount |
| ¹ / ₄ " Fuel Line | 1 | Fuel Line From Tank To Motor |
| Hose Clamps | 4 | For Mounting Fuel Line |

NOTE: Your cart must have a minimum of a 3" lift kit installed for this kit to fit. Lift Kit is NOT included in the install kit.

Before beginning be sure to read and understand the instructions. This kit is designed to give you maximum torque for those extreme off-road conditions. We thank you for your purchase of Jake's Big Block Conversion Kit and hope you enjoy the raw power it will provide!

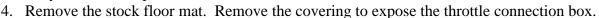
Caution: Wear appropriate eye protection during the install. Make sure the car is supported by proper use of jack stands. Heavy lifting should be done with proper lifting equipment to prevent any injury.



Installation Instructions:

- 1. Disconnect the battery and all electrical wiring. This means all wiring from dash, foot pedal box and all other components on the car.
- 2. Remove the fuel lines and cap them off to prevent leakage. Remove exhaust, throttle/choke cables and air cleaner assembly. Remove drive belt and all engine mounting bolts.
- 3. Lift engine out of the cart being careful not to bump the rear
 - body or other components in the car. The cart should now look like **FIGURE 1**.

Figure 1



- 5. Unhook the rear brake cable. The brake cable will be re-routed through the swing arm as shown in **FIGURE 2**. If your cart has the dual shifter cables like shown in **FIGURE 2** you need to unhook them from the stock shifter lever at this time. Once new engine mounts are in place the cables will be rerouted through the new swing arm (ITEM A) as shown in **FIGURE 2**. If your cart has the single shifter cable it will stay in the stock location and does not need removed.
- 6. Remove the stock front swing arm mount. For your reference FIGURE 1 shows the stock front swing arm mount still installed in the cart.
- 7. Using the supplied 3/8 x 1, 3/8 x 2 ½ bolts, 3/8 washers & 3/8 locknuts bolt the front swing arm mount plate (ITEM B) to the stock frame as shown in FIGURES 2 & 2-B. NOTE: Make sure you use the stock frame spacers as shown in FIGURE 2-B.
- 8. Using the supplied ½ x 1 ½ bolts, washers & locknuts install the new swing arm
- Figure 2

 3/8 x 1

 3/8 x 2 1/2

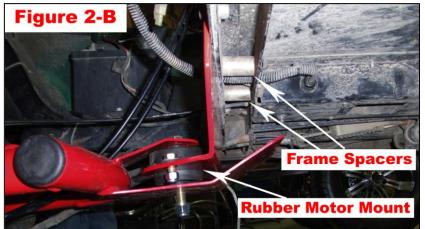
 1/2 x 3 1/2

 3/8 x 1

Stock Front Swing Arm Mount

(ITEM A) to the rear drive unit flange as shown in **FIGURES 2 & 2-C.**

9. Using the supplied rubber motor mount (ITEM H) bolt the swing arm (ITEM A) to the front swing arm mount (ITEM B) using the supplied ½ x 3 ½ bolt, washers & locknut as shown in **FIGURES 2 & 2-B.**





10. Re-route the rear brake cable

through the swing arm mount (ITEM A) as shown in **FIGURE 2.** Reattach the rear brake cable.

11. Remove the key switch/throttle assembly from the engine as shown in **FIGURE 3.** The throttle

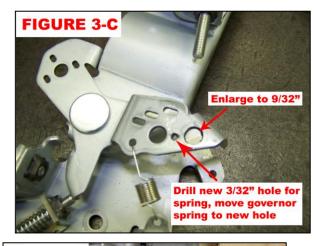
and choke cable from the engine will not be used. You will reuse the key switch & hour meter. Mount the key switch and hour meter that was removed from the engine to the supplied Jake's Big

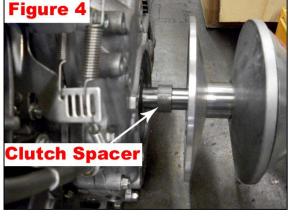


Block body plate as shown in **FIGURE 3-B.**

- 12. Remove the throttle bracket from the engine. Using a 9/32" drill bit enlarge the outer hole on the bracket as shown in **FIGURE 3-C.** Move the throttle connector to the new enlarged hole. This is where you throttle cable will hook up. Using a 3/32" drill bit drill a new hole in the throttle bracket between the two holes as shown in **FIGURE 3-C.** This hole will be the new location of your governor spring as shown in **FIGURE 3-C & FIGURE 8**.
- 13. Using the supplied clutch bolt, washer & lock washer (these are in the clutch box), 1 ½" clutch spacer, & ½" keyway bolt clutch (ITEM F) to drive shaft. **NOTE: FIGURE 4 shows the clutch spacer goes behind the clutch.**





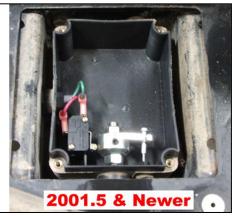


- 14. Set the engine in place with drive shaft to the driver side of the cart and bolt motor to the four holes in the new swing arm/motor mount (ITEM A) with supplied 7/16 x 2 bolts, washers & locknuts.
- 15. Install drive belt (ITEM E) to drive and driven clutch.
- 16. Using the supplied exhaust gaskets and bolts on the motor install the header (ITEM G). NOTE: These bolts and gaskets are not supplied with the install kit, they come with

the engine.

17. The ground wire coming from the battery splices into two wires. Cut and discard the shorter ground wire. Using the longer ground wire connect ground to engine bolt beside oil dipstick. Connect positive battery cable to the starter as shown in FIGURE 5.





ositive from battery, key switch wire

goes to starter bolt

18. If your cart was made from 2001.5 & newer remove the stock throttle cable from the front throttle assembly under the floorboard and install the supplied throttle cable (Item D). If your cart was made from 1994.5-2001.5 you will use the stock throttle cable (ITEM D).

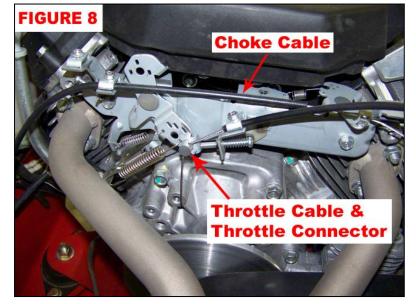
NOTE: FIGURE 6 shows the

difference between the two models. Make sure the cable is routed so it does not interfere with any moving parts. 1994.5-2001.5 models will run the throttle cable through the slot in

FIGURE 7

the front swing arm mount plate (ITEM B).

- 19. Pull the threaded rod on the throttle cable as far as it will go. Cut the throttle cable as close to the end of the threaded rod as shown in FIGURE 7.
- 20. Reattach the throttle cable bracket to the engine. Install the throttle connector to the enlarged outer hole that you drilled and attach throttle cable as shown in FIGURE 8.





Attach push-on connector from key

switch to starter

21. Reattach the springs as shown in FIGURE 8. NOTE: Remember to move the large spring to the now hole you drilled as shown in FIGURE 3-C & FIGURE 8.



22. Remove the threaded end from the supplied choke cable (Item D). Make sure you only cut through the protective coating to expose

the cable. Do not cut the cable. **FIGURE 9** shows the threaded end removed from the choke cable.

23. Install choke cable to the engine as shown in FIGURE 8.

24. Drill holes and mount regulator to the frame support using the 1/4" x 1 bolts, locknuts & washers as shown in FIGURE 10.

25. Use the provided template cut the key switch plate hole in the front portion of the rear body as shown in **FIGURE 11.** Mount the key switch plate from (Item I) to the body and connect wiring plugs to regulator and engine.

26. Install new choke cable (Item D) to the stock choke cable location.

27. Connect new fuel line (Item C) from gas tank to

28. Tie up all loose wires to prevent damage or vibration.

29. Start the engine. Adjust throttle as needed. To adjust throttle hold accelerator to the floor with the engine off. Slide cable forward just enough to clamp into place. Tighten the wire end clamp. Let off pedal and you should see a return to idle position. Press the pedal to floor board and check for full throttle opening. If you do not see full





throttle then loosen cable clamp and pull it back just enough to achieve full throttle. You will have sort of a balancing act between full throttle and idle. Make sure you take the time to get to that balance point. Failure to do so will result in loss of full power, speed and idle. Final idle adjust is located under the air cleaner assembly. Governed RPM should be 3600 for good results. NOTE: Warranty is void if rpm limiter is disconnected or by-passed in any way!

NOTE: These kits are designed to be started in gear. The engines are made to idle higher than normal golf car motor. With this in mind you will not be able to shift from neutral to forward or reverse without shutting the motor off first. Failure to do so will result in damage to rear end/transmission. The higher idle will also keep the clutch engaged which will require you to keep the brake engaged if sitting with motor running. We do NOT recommend having the engine running and the cart sitting still. If you are setting still for more than 30 seconds turn the engine off! We recommend installing a Jake's hydraulic front brake kit with all big block conversion kits to increase your stopping power.

Indemnification And Insurance Agreement

Indemnification And Insurance Agreement
High Performance Enhancement Kit purchaser assumes sole and entire
responsibility for, and shall indemnify and save harmless Nivel LLC, from
any and all claim, liability, responsibility, and persons or property that
may be sustained in connection with the use of any product before or
after purchase, including but not limited to high performance enhancement
engines. The High Performance Enhancement Kit purchaser also shall
indemnify Nivel LLC with respect to any and all liability that may be incurred.
Golf Cars are recommended for use only by those aged 1s and older.
Golf Cars can be especially hazardous to operate. Always remember
that riding and alcohol/drugs don't mix. Never ride on public roads.
Never carry more than two passengers (except shuttles and trams).
Never engage in stunt driving, Avoid excessive speeds and be particularly
careful on difficult terrain. Nivel LLC reserves the right, at any time, to
discontinue or change specifications, prices, designs, features, models,
or equipment without notice and without incurring any obligation.



