

## GEMO- VELOREX

*Installation and adjustment of the **GEMO VELOREX** contactless ignition system.*

### 1.Assembly of components:

*Carry out the initial assembly of the components in the engine in such a way that the components can be moved-i.e. not tightened 'at the ready'.*

- Fit and screw on the spark trigger (steel plate with a flat piece of metal) in place of the original ignition cam.
- Fit and screw the pulse generator plate in place of the original interrupter assembly.

#### **NOTE!**

***Place the high-voltage coils and the module and screw them into the vehicle 'at the ready'- there is no need to move them or make any adjustments.***

- Place the ignition module in the vehicle.
- Place 2x high-voltage coils in the vehicle.

#### **NOTE!**

***Please note the 6mm mesh at the green-ground wires. The 6mm grommets MUST be screwed to the vehicle's ground source (negative pole). Before tightening them, check the condition of the surface to which they will be screwed - if necessary, the contact areas of the mesh should be cleaned of paint and other substances.***

**THERE MUST BE A NEGATIVE POLE (GROUND) TRANSITION BETWEEN EACH MESH AND THE ENGINE!!!**

- Connect all the components placed in the vehicle with the electrical harnesses included in the kit using the supplied wiring diagram.

#### **NOTE!**

***The black arrow with the number 1 (the black wire going from the ignition module) should be connected to the existing vehicle installation in such a way that:***

-when the ignition is switched on and in any ignition position in which the engine can run, +12V current flows to the black wire

The black wire is the 'excitation' wire, the so-called 'plus after/behind the ignition'; the same wire is the wire going to the original high-voltage bottle coils, i.e. the wire from the original voltage coils can be plugged into the black wire from the ignition module

The black wire **MUST** connect in the ignition switch to PIN 15

## 2. Adjustment:

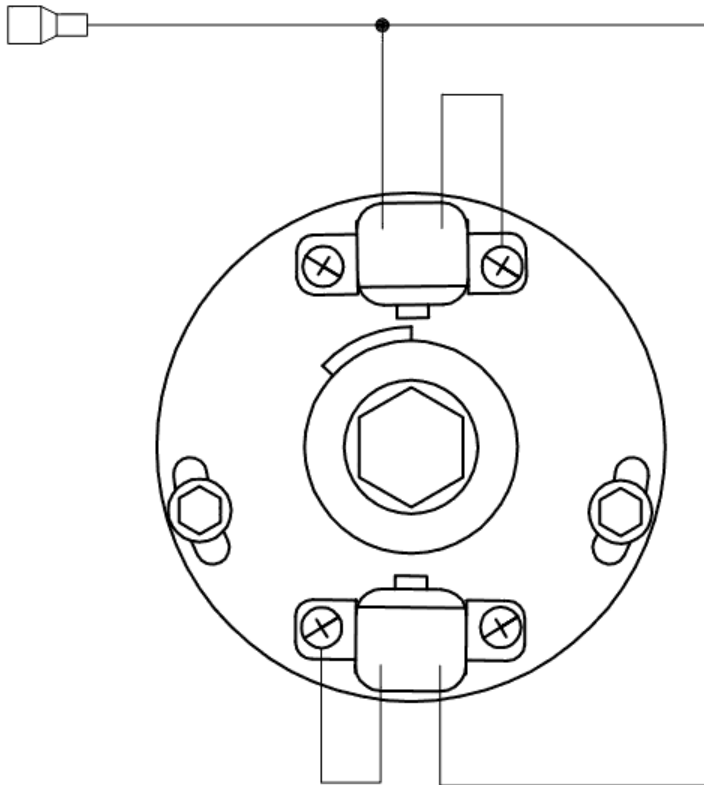
- Unscrew the spark plugs
- Using a dial gauge or angle dial, determine the desired ignition advance on one of the cylinders.
- Position the spark trigger so that the beginning of the plate (trigger marker) 'rides' on the centre point of the pulse generator.

***This alignment of the marker to the pulse generator= ignition spark advance point***

### NOTE!

**It does not matter on which pulse generator the ignition advance point is set!**

ILLUSTRATION SHOWING THE SETTING OF THE TRIGGER ACCORDING TO THE PULSE GENERATOR AT THE MOMENT OF THE SPARK ADVANCE:



- If the trigger has been set as described, it must be tightened with the central screw so that it cannot be adjusted (spring washers and medium bonding glue for threaded connections are recommended).

- Possible small corrections of the trigger- pulse generator setting can be carried out by moving the pulse generator plate. If no correction is required, the pulse generator plate should be tightened with screws (and plain and spring washers) so that the assembly cannot loosen and move.
- Setting the gap between the trigger marker and the tab on the pulse generator:
  - set one of the trigger markers in the centre of the pulse generator
  - release the fastening screws of the pulse generator
  - slide the encoder to the marker so that the distance between the marker and the tab on the encoder is between 0.1 and 0.3mm **(ONE THOUSAND AND THREE THOUSAND PARTS OF A MILLIMETER!)**
  - tighten the pulse generator, moved to the specified distance

**THE DESCRIBED OPERATION MUST BE REPEATED IN AN IDENTICAL MANNER FOR THE SECOND PULSE GENERATOR.**

**HAPPY TRAILS!**