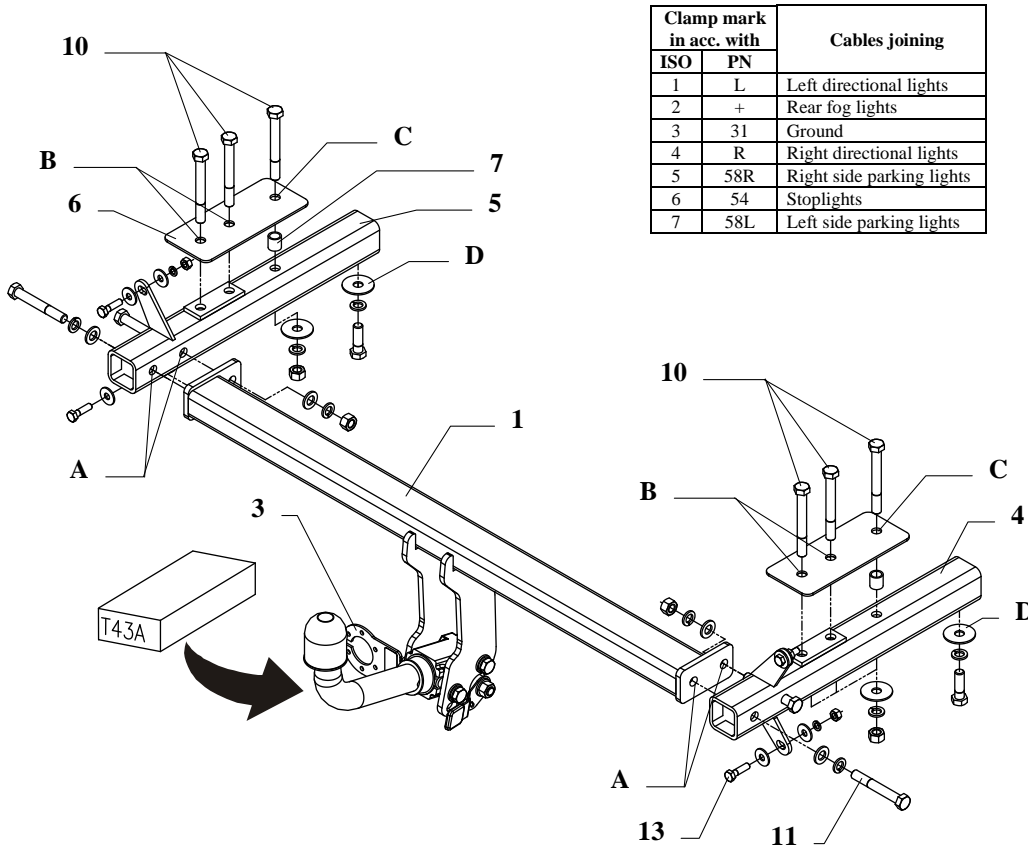


## FITTING INSTRUCTION



This towbar is designed to assembly in following car:  
**KIA CARENS I II, (FC, FJ) VAN** produced since 01.2000 till 08.2006,  
 catalogue no. **T43** and is prepared to tow trailers max total weight **1250 kg**  
 and max vertical load **75 kg**.

### *From manufacturer*

Thank you for buying our product. Their reliability has been confirmed in many tests. Reliability of towbar depends also on correct assembly and right exploit. For this reasons we kindly ask to read carefully this instruction and apply to hints.

*The towbar should be install in points described by a car producer.*

## The instruction of the assembly

1. Lower the exhaust then remove the rear lights.
2. Remove the floor cover of the luggage trunk then loose the side plastic covers and fold them to the center of the trunk.
3. Remove the bumper and its inset then remove the bumper brackets (these will not be reinstalled later).
4. Enlarge the „C” factory holes on the floor plate of the trunk with a  $\varnothing 18\text{mm}$  drill.
5. Put side brackets (pos. 4 and 5) into the chassis extension then according to the drawing loosely fix them at positions „B”, „C” and „D” with the attached bonding units (The accessory plates pos. 6 will be placed into the trunk, remember about distance sleeves pos. 7!).
6. According to the drawing loosely fix main bar of the towbar (1) to the brackets 4 and 5 at positions „A” with bolts M12x85mm (pos. 11).
7. Using bolts M8x30mm (pos. 13) fix inset of the bumper.
8. Fix body of the automat and place tow-ball according to supplied instruction. Note! Remember to place socket plate (pos. 3) as shown on the drawing 1.
9. Tighten all bolts according to the torque shown in the table.
10. Reassemble bumper after cut out his fragment (80x35mm) in his bottom, central part. Next reassemble the rear lights.
11. Connect electric wires of 7-poles socket according to the instruction of the car. (Recommend to make at authorized service station)
12. Complete paint layer damaged during installation.

### Torque settings for nuts and bolts (8,8):

<b>M6</b> - 11 Nm	<b>M8</b> - 25 Nm	<b>M10</b> - 50 Nm
<b>M12</b> - 87 Nm	<b>M14</b> - 138 Nm	<b>M16</b> - 210 Nm

### NOTE

After install the towbar you should get adequate note in registration book (at authorised service station). The car should be equipped with:

- Indicators
- Tow mirrors

After 1000km of exploitation check all bolts and nuts. The ball of towbar must be always kept clear and conserve with a grease.

## Towbar accessories:

Pos. 1 Name: Main bar Quantity: 1	Pos. 6 Name: Fish-plate Quantity: 2	Pos. 12 Name: Bolt 8,8 B Quantity: 2 Dim.: M12x40mm
Pos. 2 Name: Tow ball Quantity: 1	Pos. 7 Name: Distance sleeve Quantity: 2 Dim.: $\varnothing 17.2 \times 2$ , L=18mm	Pos. 13 Name: Bolt 8,8 B Quantity: 4 Dim.: M8x30mm
Pos. 3 Name: Socket plate Quantity: 1	Pos. 8 Name: Washer Quantity: 8 Dim.: $\varnothing 37 \times \varnothing 12.5 \times 3$ mm	Pos. 14 Name: Nut 8 B Quantity: 8 Dim.: M12
Pos. 4 Name: Right bracket Quantity: 1	Pos. 9 Name: Washer Quantity: 8 Dim.: $\varnothing 24 \times \varnothing 8.4 \times 2$ mm	Pos. 15 Name: Nut 8 B Quantity: 4 Dim.: M8
Pos. 5 Name: Left bracket Quantity: 1	Pos. 10 Name: Bolt 8,8 B Quantity: 6 Dim.: M12x100mm	Pos. 16 Name: Plain washer Quantity: 4 Dim.: $\varnothing 13$ mm
	Pos. 11 Name: Bolt 8,8 B Quantity: 4 Dim.: M12x85mm	Pos. 17 Name: Spring washer Quantity: 12 Dim.: $\varnothing 12.2$ mm
		Pos. 18 Name: Spring washer Quantity: 4 Dim.: $\varnothing 8.2$ mm



**PPUH AUTO-HAK Sp.J.**

Produkcja Zaczepów Kulowych  
Henryk i Zbigniew Nejman  
76-200 SŁUPSK ul. Słoneczna 16K  
tel/fax (059) 8-414-414; 8-414-413  
E-mail: [office@autohak.com.pl](mailto:office@autohak.com.pl)  
[www.autohak.com.pl](http://www.autohak.com.pl)

## Towing hitch (without electrical set)

Class: **A50-X** Cat. no. **T43A**

Designed for:

Manufacturer: **KIA**

Model: **CARENS I II**

Type: **(FC, FJ) VAN**

produced since 01.2000 till 08.2006

Technical data:

**D-value: 7,6 kN**

maximum trailer weight: **1250 kg**

maximum vertical cup load: **75 kg**

Approval number according to Directive 94/20/EC: **e20\*94/20\*1019\*00**

## Foreword

This towbar is designed according to rules of safety traffic regulations. The towing hitch is a safety component and can be install only by qualified personnel. Any alteration or conversion of the towing hitch is prohibited and would lead to cancellation of design certification. Remove insulating compound and underseal from vehicle (if present) in the area of the matting surfaces of the towing hitch. The vehicle manufacturer's specifications regarding trailer load and max. vertical cup load are decisive for driving whereat values for the towing hitch cannot be exceeded.

*D-value formula:*

$$\frac{\text{Max trailer weight [kg]} \times \text{Max vehicle weight [kg]}}{\text{Max trailer weight [kg]} + \text{Max vehicle weight [kg]}} \times \frac{9,81}{1000} = D \text{ [kN]}$$