

Subject: Permitted modification of the nose landing gear

Concerning: G 115 s/n 8008 thru 8088

Urgency: Optional

Procedure: In order to optimize the rolling characteristics of the G 115 on ground, improvements have been developed which are now offered to the customers for re-equipment.

Actions: 1. Based on

	Flange	Mount	Wedge
Standard G 115	115-5210	115-5218	-----

there are four different possibilities:

	Flange	Mount	Wedge
Modification 1	115-5210	115-5218/1	115-5200.16**
Modification 2	115-5210	115-5218/2*	115-5200.16
Modification 3	115-5210/1	115-5218/1	-----
Standard G 115A	115-5210/1	115-5218/2*	-----

* in connection with plate 115-6021 and rivet nut plate 115-6022 as well as new fuel line 115-6275.
**with steering damper 115-4220 (revision a dated 06.05.91).

The re-equipment of flange 115-5210/1 requires installation of new wheel fairings (115-5270/5271)

2. The installation of a grease nipple is recommended.

The re-equipment is to be done according to Repair Instructions for Service Bulletin TM 1078-15.


Material: The material (incl. Repair Instructions) can be obtained from the manufacturer on inquiry.

Weight and Balance: Negligible

Remarks: The work must be carried out by a competent person or an authorized aviation work-shop and has to be certified in the logbook by an authorized inspector.

Mattsies, 06 May 1991

LBA approved


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The modification contained in this Service Bulletin has been approved by the LBA on the 8 July 1991.
The translation has been accomplished to our best knowledge and judgement. In case of doubt, the German original is authoritative.

The Repair Instruction No. 1078-15 is part of the Service Bulletin TM 1078-15 and contains the permitted modification of the nose landing gear and the installation of a grease nipple.

Material: The required re-equipment set can be obtained by the aircraft manufacturer on inquiry.

Re-equipment set

Modification 1:

- mount 115-5218/1
- wedge 115-5200.16
- bushing long 115-4220.05
- 4 ball socket DIN 6319 C8,4
- 4 ball plate DIN 6319 D9,6
- 4 screws M8x36 LN 9037

Modification 2:

- mount 115-5218/2
- wedge 115-5200.16
- plate 115-6021
- rivet nut plate 115-6022
- 4 screws M5x12 LN 9037
- fuel line 115-6275
- securing ring 115-6023.01
- 4 ball plate DIN 6319 D9,6
- 4 ball socket DIN 6319 C8,4
- 4 screws M8x36 LN 9037

Modification 3:

- mount 115-5218/1
- flange 115-5210/1
- nose wheel fairing 115-5270/5271
- 4 screws M8x32 LN 9037

Standard G 115 A:

- mount 115-5218/2
- flange 115-5210/1
- fuel line 115-6275
- rivet nut plate 115-6022
- 4 screws M8x32 LN 9037
- nose wheel fairing 115-5270/5271
- plate 115-6021
- securing ring 115-6023.01
- 4 screws M5x12 LN 9037

Grease nipple installation

- grease nipple Art.No.: 038281 of Fa. Kleiner
- hexagon nut M6 LN 9348

Tools: Standard set of tools

Work to be performed

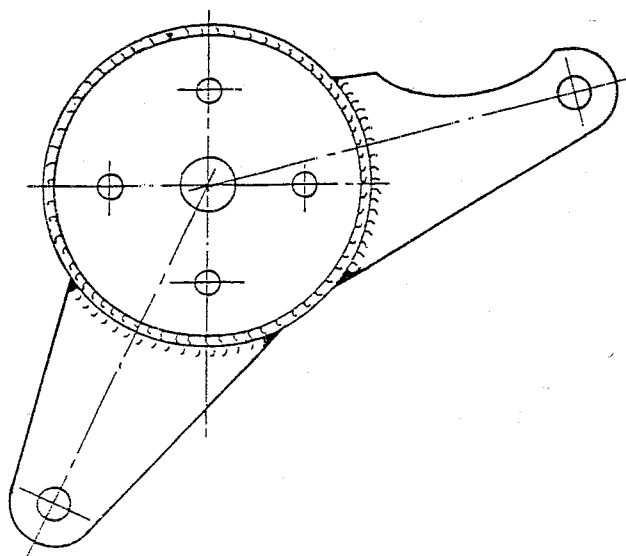
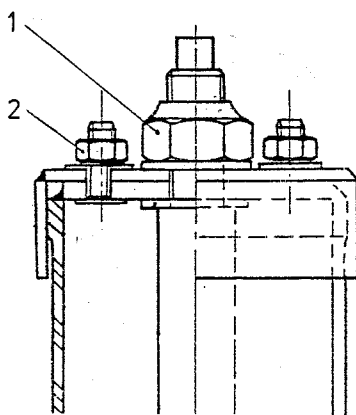
Modification	Section
I. Modification 1	A and B (wedge modification)
II. Modification 2	B (wedge modification) and C
III. Modification 3	A and B
IV. Standard G 115A	B and C

A. Mount - Modification

The mount 115-5218/1 can be installed without dismantling the nose landing gear.

1. Remove cowling (refer to MM Chapter 71-10).
2. Loosen eye-end (damper) and eye-end (nose wheel control) (refer to MM Chapter 32-20).
3. Hold bolt with an Allen or an open-ended wrench when removing the central nut (1) on the upper mount. Remove 4 nuts (2).
4. Remove actual mount.
5. Install mount 115-5218/1 in reverse sequence.
6. Install damper eye-ends and nose wheel control eye-ends.
7. Check that nose wheel is released, in central position and locked. Adjust eye-ends that rudder pedals are in neutral position.

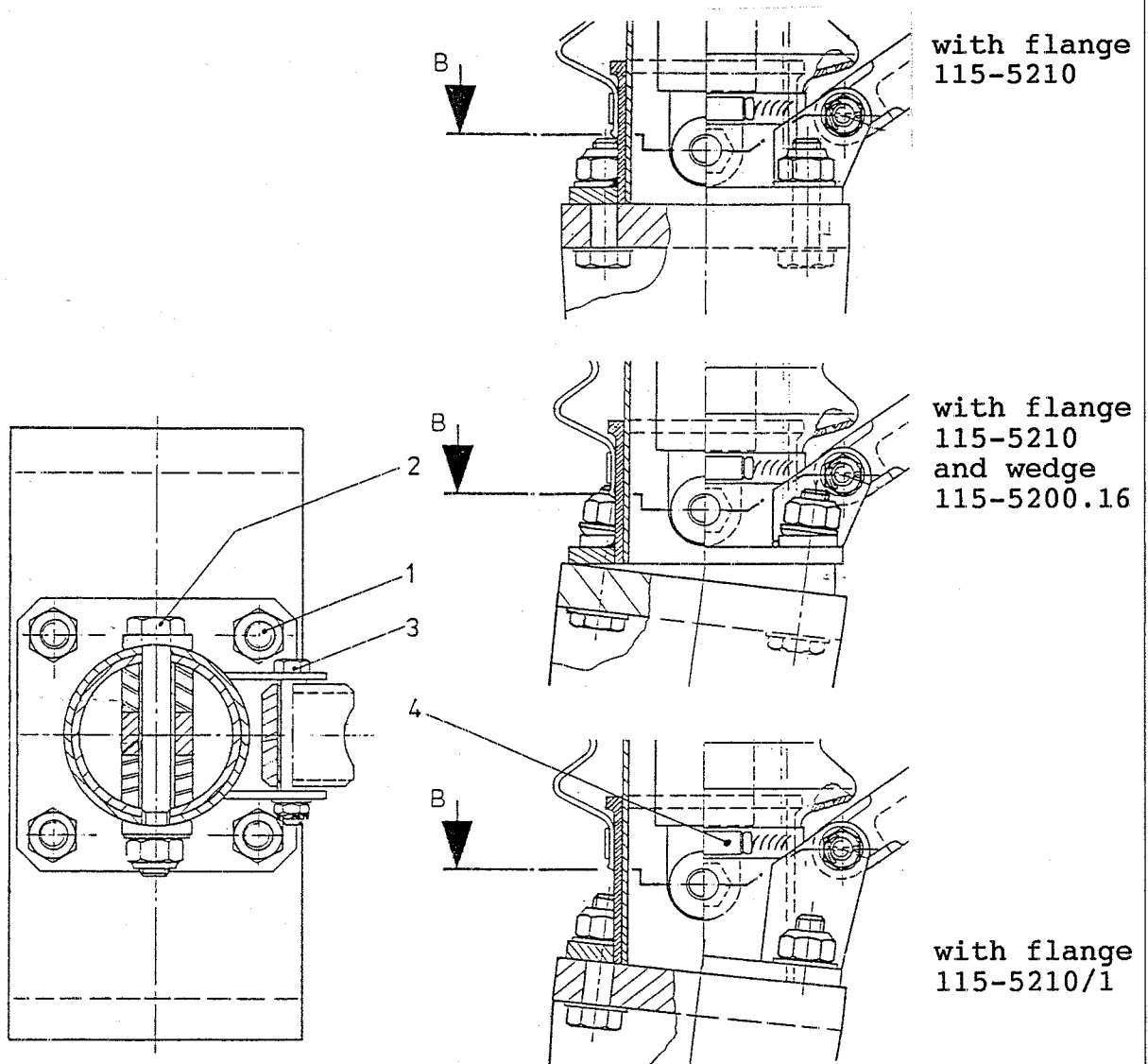
Mount



B. Flange / Wedge- Modification

1. Remove nose wheel (refer to MM Chapter 32-20).
2. Remove four screws (1) on flange and remove nose wheel fork and nose wheel fairing. Remove screws (2) and (3). Loosen clamp (4) securing the bellows. Remove bellows from flange.
- 3a. Install wedge 115-5200.16 or an alternate method is
- 3b. Remove flange 115-5210 and install flange 115-5210/1 - do not install a wedge!
4. For assembly execute work steps 1 and 2 in reverse sequence. For flange 115-5210 in connection with wedge 115-5200.16 use screws M8x36. Also ball sockets and ball plates DIN 6319 are required for this installation. For flange 115-5210/1 use screws M8x32.

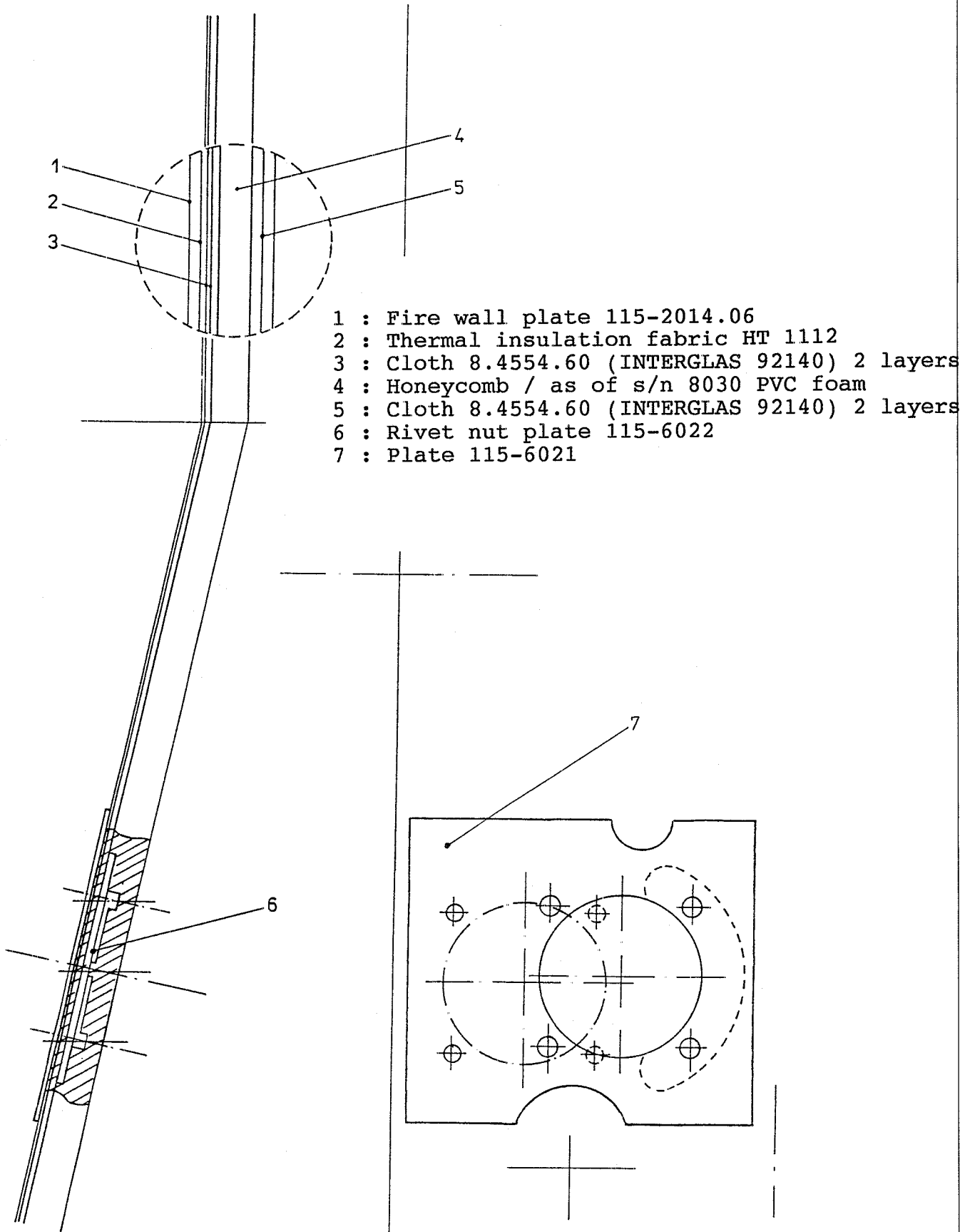
Flange



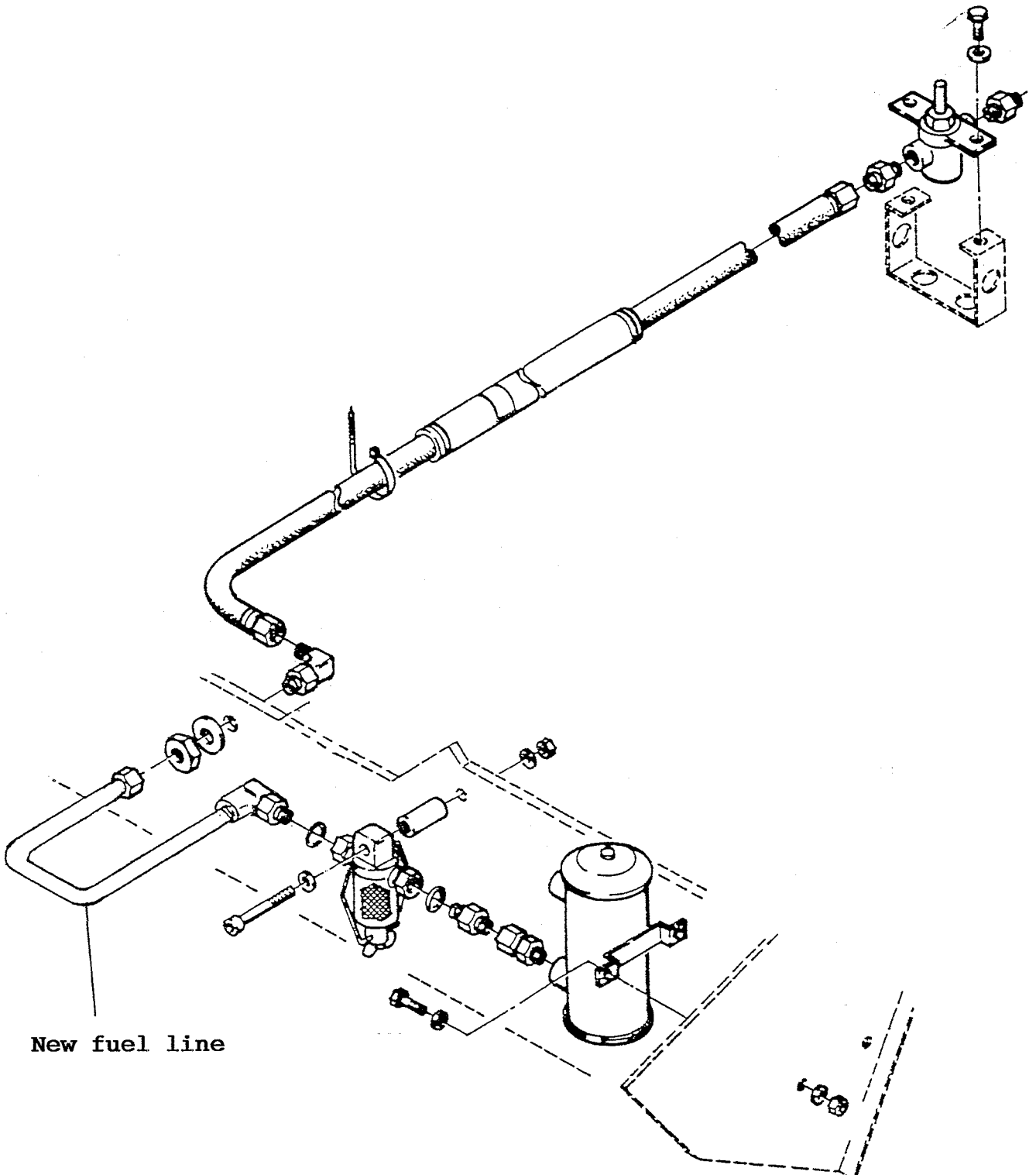
C. Modification Standard G 115A

1. Remove cowling (refer to MM Chapter 71-10).
2. Loosen eye-end from the nose wheel control rod and eye-end from damper (refer to MM Chapter 32-20).
3. Completely remove nose landing gear (refer to MM Chapter 32-20).
4. Close fuel cock, then dismount fuel hose between firewall and fuel filter (refer to MM Chapter 28-20). Close fittings with blind plugs.
5. Remove RH/LH side plates from the center console (refer to MM Chapter 25-10).
6. Loosen and remove four screws M5 from the bellows at the firewall. Move bellows from its position backwards away from firewall.
7. Using the attached plate 115-6021 as a pattern, mark the section which has to be removed and then grind off.
8. Mark the new drill holes and drill them with a dia. of 5,2 mm.
9. Within the area of the rivet nut plate 115-6022, remove the honeycomb (as of s/n 8030 PVC foam) until the rivet nut plate is completely fitted, as shown on page 5.
10. Fix rivet nut plate with two screws.
11. Attach rivet nut plate and fill space with thickened resin. Then cure and plaster.
12. Remove the two fixing screws.
13. Fix plate 115-6021 in the "old" drillings with two M5x24 screws to the firewall.
14. Pull bellows through hole from the inside and install with four M5x12 screws and the new securing ring 115-6023.01 in the new drilled holes in plate 115-6021.
15. The edges of the plate 115-6021 are to be made tight with a fireproof jointing compound (Dirko).
16. Install RH/LH side plates at the center console.
17. The actual mount is to be exchanged against the new mount 115-5218/2. The mount 115-5218/2 should be ground on the shank as shown on page 2.
18. Hold bolt with an Allen or an open-ended wrench when removing the central nut (1) on the upper mount. Remove 4 nuts (2) (refer to page 2).
19. Remove actual mount.
20. Install mount 115-5218/2 in reverse sequence.
21. Install nose landing gear (refer to MM Chapter 32-20).
22. Install damper eye-ends and nose wheel control eye-ends (refer to MM Chapter 32-20).
23. Check that nose wheel is released, in central position and locked. Adjust eye-ends that rudder pedals are in neutral position.
24. Install new fuel line (see page 6).
25. Pressurize fuel system and check fuel line for leaks.
26. Install cowling (refer to MM Chapter 71-10).

Modification of the fire wall



Installation of a new fuel line 115-6275



New fuel line

Grease nipple installation on the nose landing gear

1. Remove and disassemble nose landing gear (refer to MM Chapter 32-20).
2. Mark position of the grease nipple.
3. Drill dia. 8,1 mm and remove burrs.
4. Install hexagonal nut M6 on drilled hole and weld nut on nose landing gear.
5. Chase screw thread.
6. Install grease nipple.
7. Install grease gun on nipple, check that grease flows through hole.
8. Assemble and install nose landing gear (refer to MM Chapter 32-20).

Welding procedure: WIG

Welding material: 1.7734.2

