OVERHEAD CIRCUIT
BREAKER PANEL
(REF)

4. RATIO CHANGER
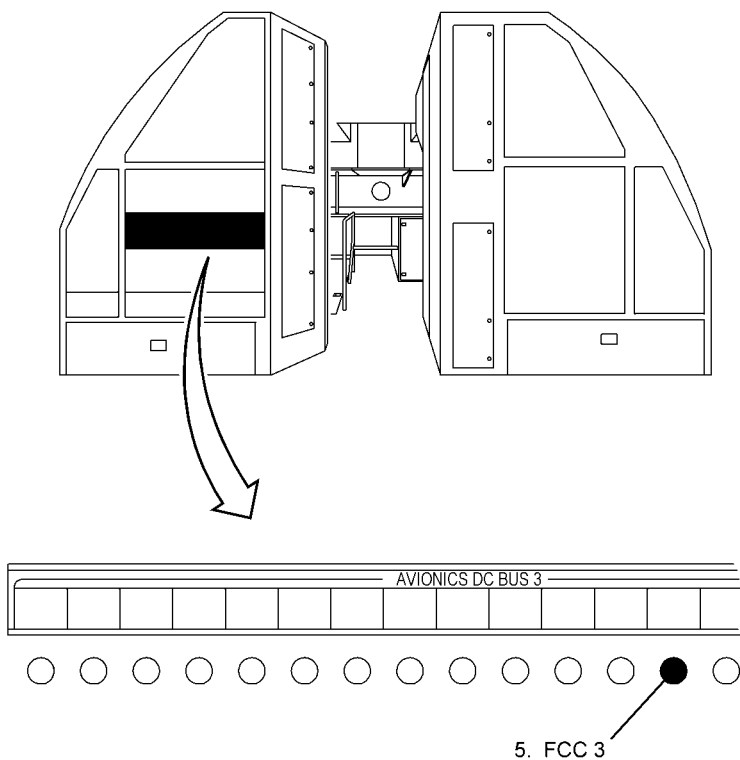   ACTUATOR ROLL

2. SCEFC 1

3. SCEFC 2

1. FCC 4

ICN-88277-G2715025-006-01

5. Remove warning tag and close **FCC 3** circuit breaker on Electrical Power Center (EPC), row **T**, column **24**.

AVIONICS DC BUS 3

5. FCC 3

ICN-88277-G2715026-005-01

27-15-10-3

6. Remove warning tag and close **AILERON TRIM ACTUATOR 1** circuit breaker on EPC, row **U**, column **41**.

7. Remove warning tag and close **AILERON TRIM ACTUATOR 2** circuit breaker on EPC, row **U**, column **36**.

8. Perform aileron position sensor adjustment (task 5-2).

6. AILERON TRIM ACTUATOR 1

7. AILERON TRIM ACTUATOR 2
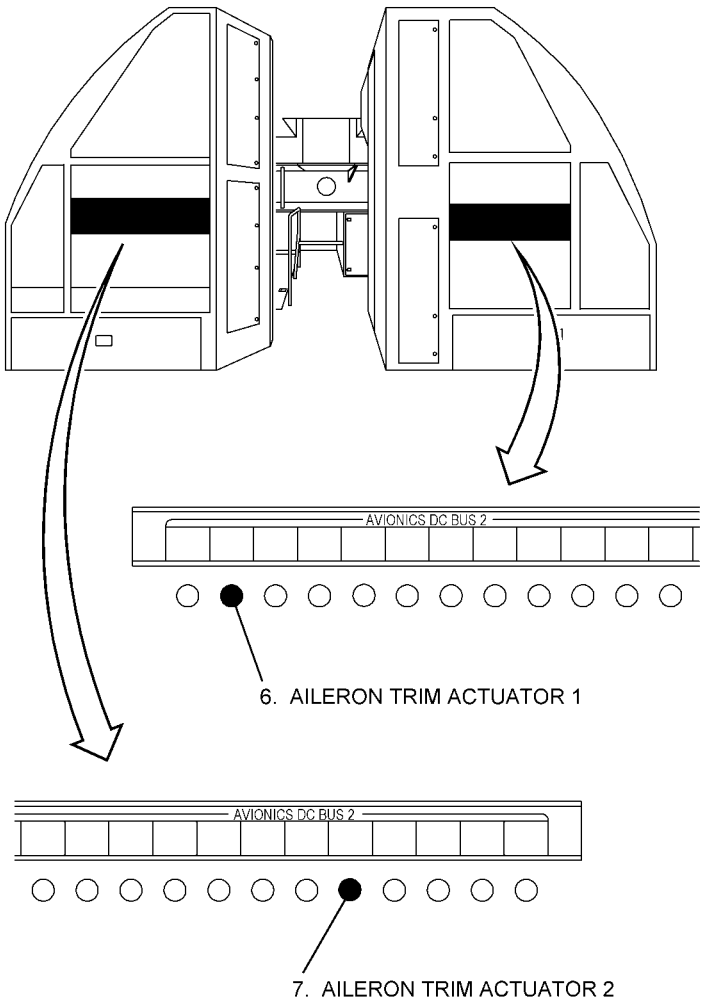
ICN-88277-G2715060-004-01

AILERON POSITION-ROTARY VARIABLE DIFFERENTIAL TRANSDUCER SENSOR ADJUSTMENT
(27-15-10-5)

FUNCTIONAL INPUT CONDITIONS:

Applicability:

Task

All

All

Additional information:

This procedure consists of the following tasks:

5-1. Adjustment for 2715AS001 and 2715AS003.

5-2. Adjustment for 2715AS002 and 2715AS004.

Task

NOTE

This is a typical adjustment task for all aileron position-rotary variable differential transducer sensors.

All

Additional data:

Task

TO   1300i-2-22JG-10-4

All

TO   1300i-2-34JG-60-1

All

TO 1300i-2-53JG-20-1

All

Personnel recommended:

Task

Two

All

Person (A) performs task.

Person (B) assists person (A).

Safety conditions:

Task

NA

--

Support equipment:

Nomenclature	PN	Specification	Qty	Task
Kit, Rig Pin	17G140015-1	--	--	--
Pin Assy 5-10	17G140015-17	--	1	All

Supplies:

| Nomenclature	PN	Specification	Qty	Task
Wire, Safety	MS20995C20	--	AR	5-1, 5-2

5-1. ADJUSTMENT FOR 2715AS001 AND 2715AS003.

1. Review ″Section 1 (General Information)″ of this TO for system general warnings, cautions, and notes.

2. Review task ″Functional Input Conditions″ page for task specific safety conditions.

3. (A) Release latch and remove crew portable oxygen cylinder and regulator.
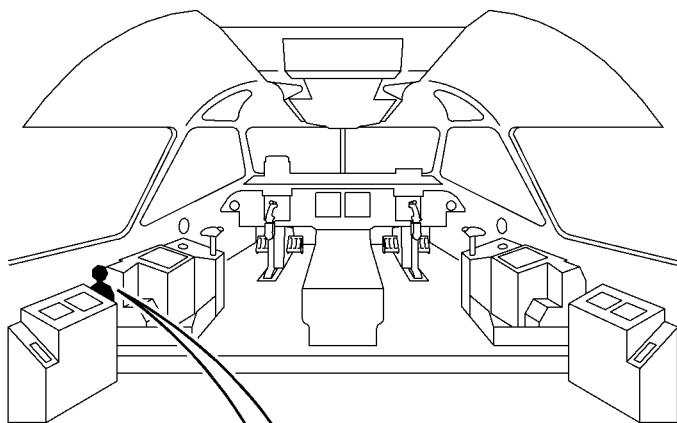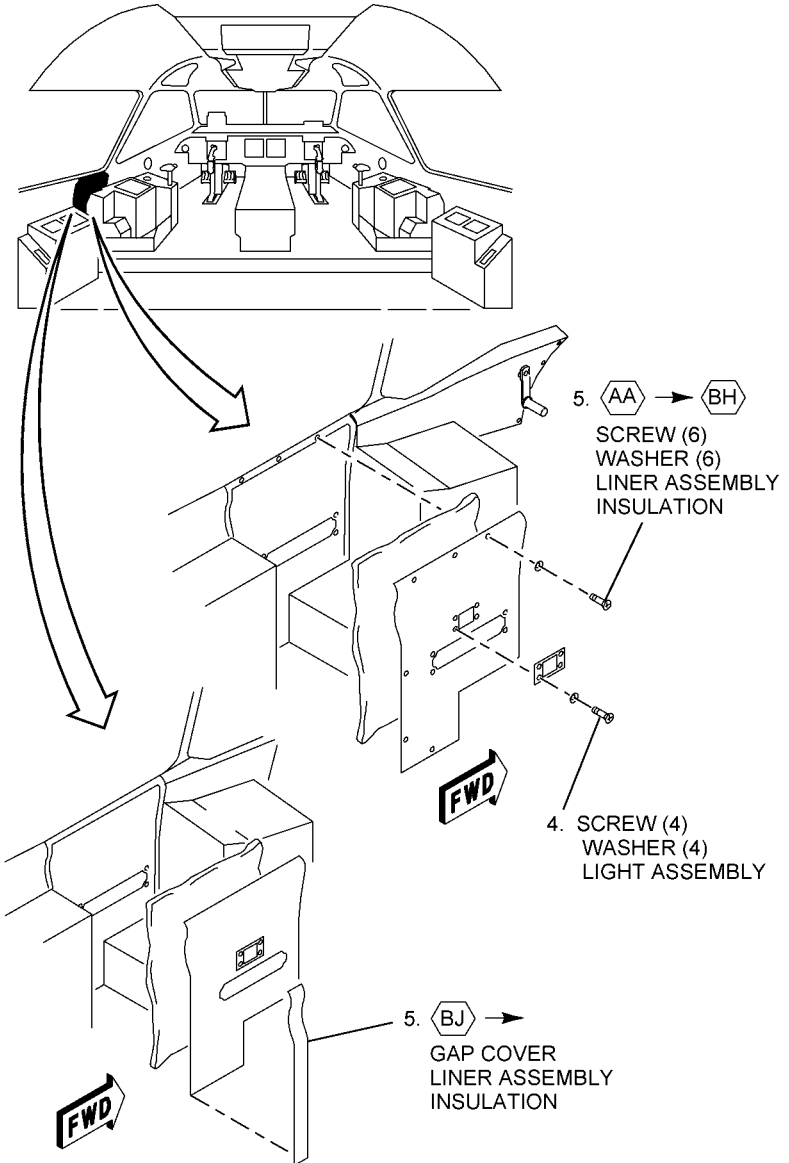
3. LATCH
   CREW PORTABLE OXYGEN
   CYLINDER AND REGULATOR
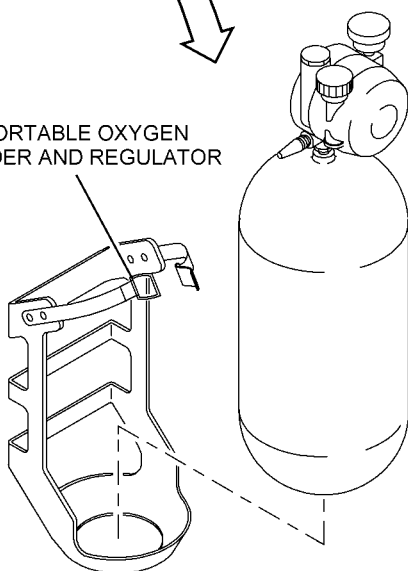
ICN-88277-G2715063-003-01

4. (A) Remove screws, washers, and light assembly.

5. $\langle\overline{AA}\rangle \rightarrow \langle\overline{BH}\rangle$ (A) Remove screws, washers, liner assembly (213FZM) and insulation.

5. $\langle\overline{BJ}\rangle \rightarrow$ (A) Remove gap cover, liner assembly (213FZM) and insulation.

5. ⟨AA⟩ ➤ ⟨BH⟩
SCREW (6)
WASHER (6)
LINER ASSEMBLY
INSULATION

4. SCREW (4)
WASHER (4)
LIGHT ASSEMBLY

5. ⟨BJ⟩ ➤
GAP COVER
LINER ASSEMBLY
INSULATION

ICN-88277-G2715064-003-01

27-15-10-5

6. (A) Remove screws from upper crew compartment floor panel (217BZY).

NOTE

Nylon cords are being eliminated by attrition, not all floor panels will have nylon cords.

7. (A) Remove and discard nylon cords.

8. (A) Remove upper crew compartment floor panel.

9. (A) Remove screws from upper crew compartment floor panel (215BZY).

NOTE

Nylon cords are being eliminated by attrition, not all floor panels will have nylon cords.

10. (A) Remove and discard nylon cords.

11. (A) Remove upper crew compartment floor panel.

8. UPPER CREW
   COMPARTMENT
   FLOOR PANEL

7. NYLON CORD (AR)

6. SCREW (16)

9. SCREW (23)

11. UPPER CREW
    COMPARTMENT
    FLOOR PANEL

FWD

10. NYLON CORD (AR)
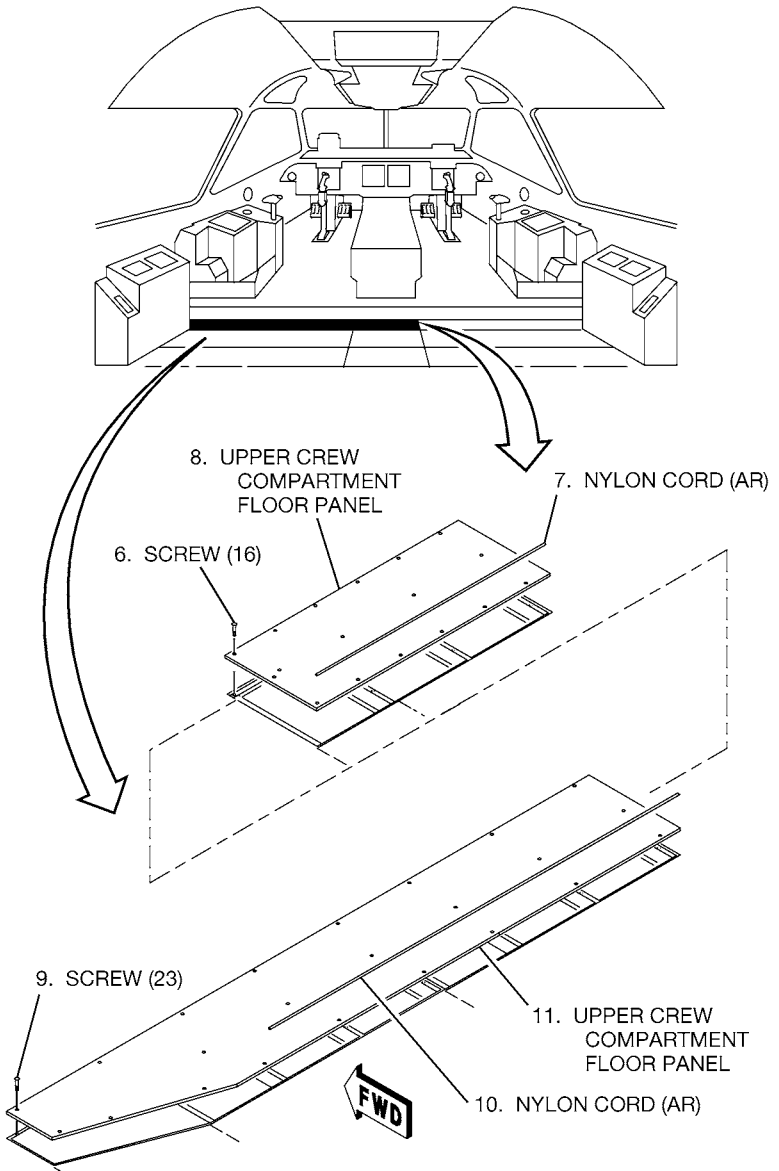
ICN-88277-G2715065-002-01

12.   Operate mission computing system (34-62-02, task 02-1).

$$\boxed{\textbf{WARNING}}$$

All flight control surfaces shall be clear of personnel and equipment prior to any movement of the surfaces. Failure to comply may cause injury to personnel or damage to aircraft.

13.   (A,B) Set pitch/roll trim switch on control stick to **LWD** or **RWD** until **AIL TRIM** indicator shows **0**.

14.   (A) Set **ROLL** switch on **FCS ACTR** panel to **PART MECH**.

FCS ACTR
PANEL
(REF)

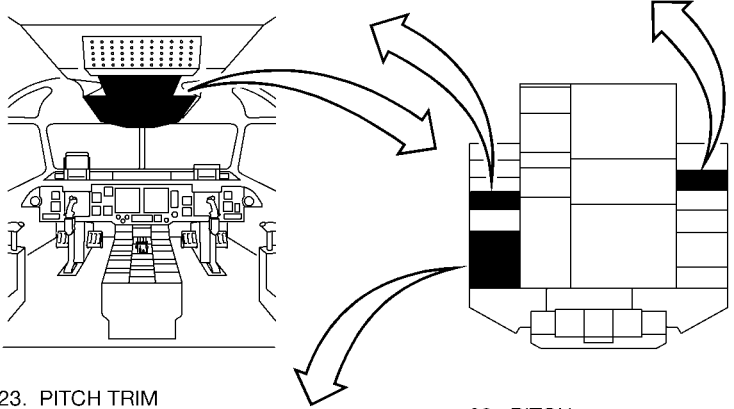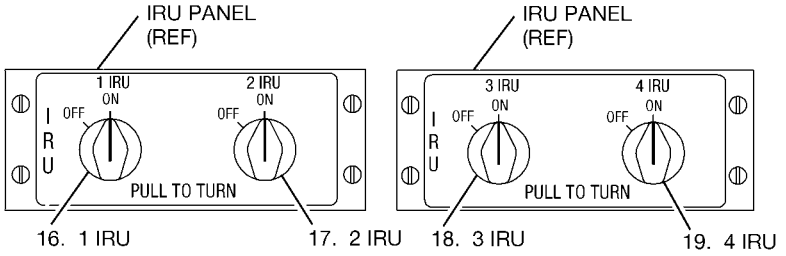14. ROLL

13. PITCH/ROLL TRIM SWITCH

CONTROL STICK
(REF)

AIL TRIM
(REF)
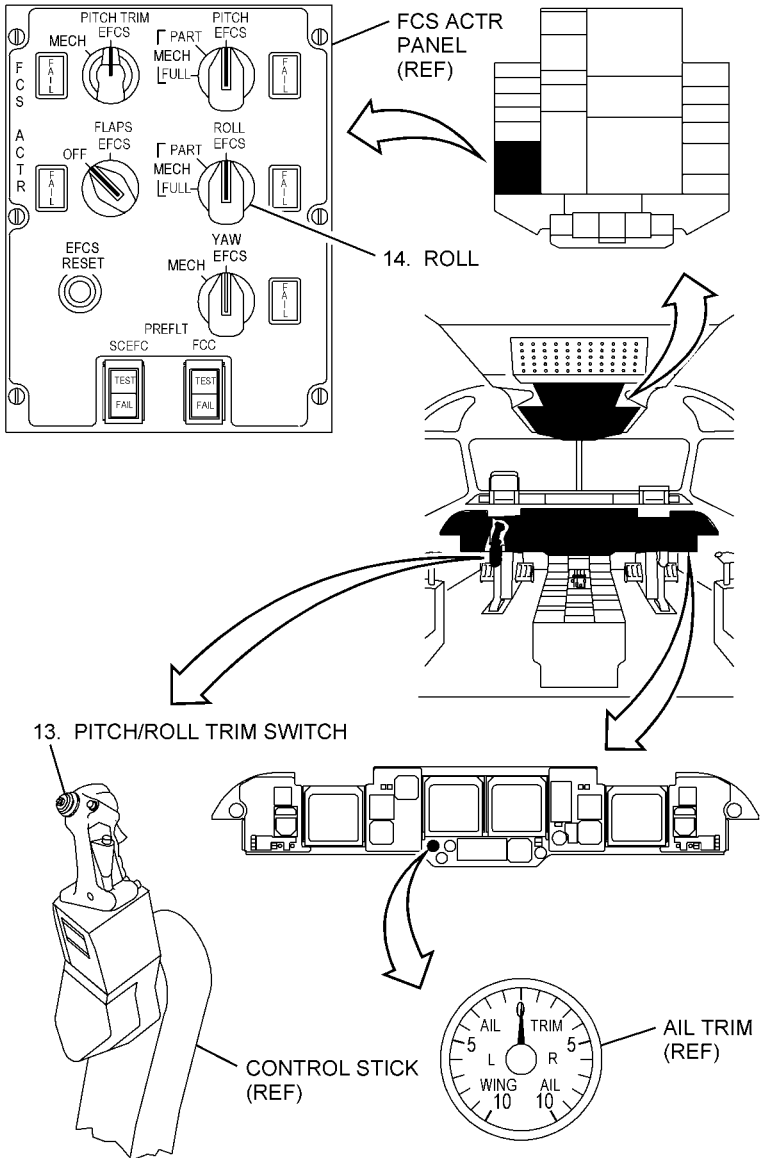
ICN-88277-G2715066-004-01

15.   (B) Install pin assy 5-10 in pilot aileron load feel control assembly.
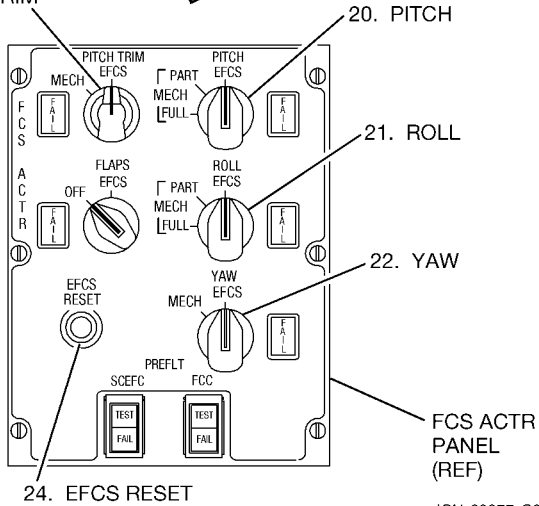
15. PIN ASSY

PILOT AILERON LOAD
FEEL CONTROL
ASSEMBLY
(REF)

FWD
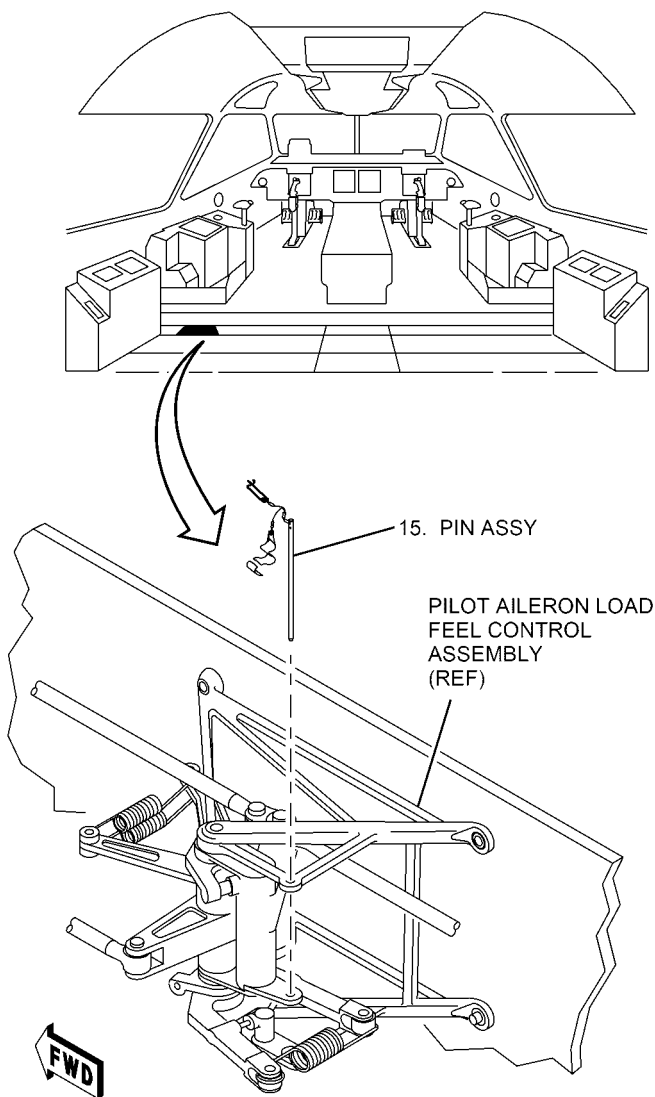
ICN-88277-G2715067-005-01

16.   (A) Set **1 IRU** switch on **IRU** panel to **ON**.

17.   (A) Set **2 IRU** switch to **ON**.

18.   (A) Set **3 IRU** switch on **IRU** panel to **ON**.

19.   (A) Set **4 IRU** switch to **ON**.

20.   (A) Set **PITCH** switch on **FCS ACTR** panel to **EFCS**.

21.   (A) Set **ROLL** switch to **EFCS**.

22.   (A) Set **YAW** switch to **EFCS**.

23.   (A) Set **PITCH TRIM** switch to **EFCS**.

24.   (A) Press **EFCS RESET** button.

IRU PANEL (REF)

IRU PANEL (REF)

1 IRU ON OFF

2 IRU ON OFF

3 IRU ON OFF

4 IRU ON OFF

I R U

PULL TO TURN

I R U

PULL TO TURN

16. 1 IRU   17. 2 IRU   18. 3 IRU   19. 4 IRU

23. PITCH TRIM

20. PITCH

PITCH TRIM EFCS
MECH

PITCH EFCS
PART MECH FULL

F C S A C T R

FAIL

FAIL

21. ROLL

FLAPS EFCS
OFF

ROLL EFCS
PART MECH FULL

FAIL

FAIL

22. YAW

EFCS RESET

YAW EFCS
MECH

FAIL

PREFLT
SCEFC   FCC

TEST FAIL

TEST FAIL

FCS ACTR PANEL (REF)

24. EFCS RESET

ICN-88277-G2715035-006-01

27-15-10-5

25. (A) Press up arrow key on **MCD** (**DU**).

    • **MSN INDEX 2** is displayed.

26. (A) Press 6L Line Select (LS) key.

    • **MAINTENANCE MENU** is displayed.

27. (A) Press 2L LS key.

    • **EFCS MAINT MENU** is displayed.

28. (A) Press 6L LS key.

    • **EFCS MEMORY INSPECT** is displayed.

29. (A) Enter 1B948 on **MCK.**

    • **EFCS MEMORY INSPECT** is displayed with address/data.

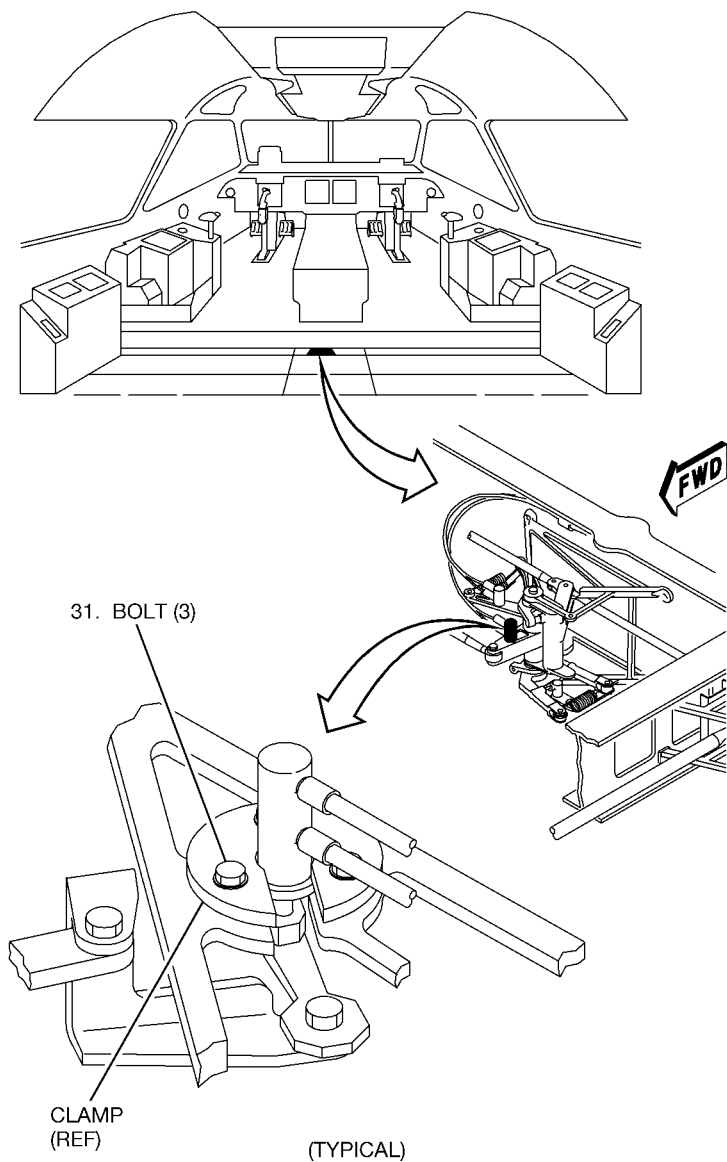30. (A) Read memory inspect data for address B948 on **MCD** (**DU**) as follows:

REF DES	FCC NO.
2715AS001	1
2715AS003	2

27. 2L

26. 6L
28.

25. UP ARROW

30. MCD (DU)

29. MCK
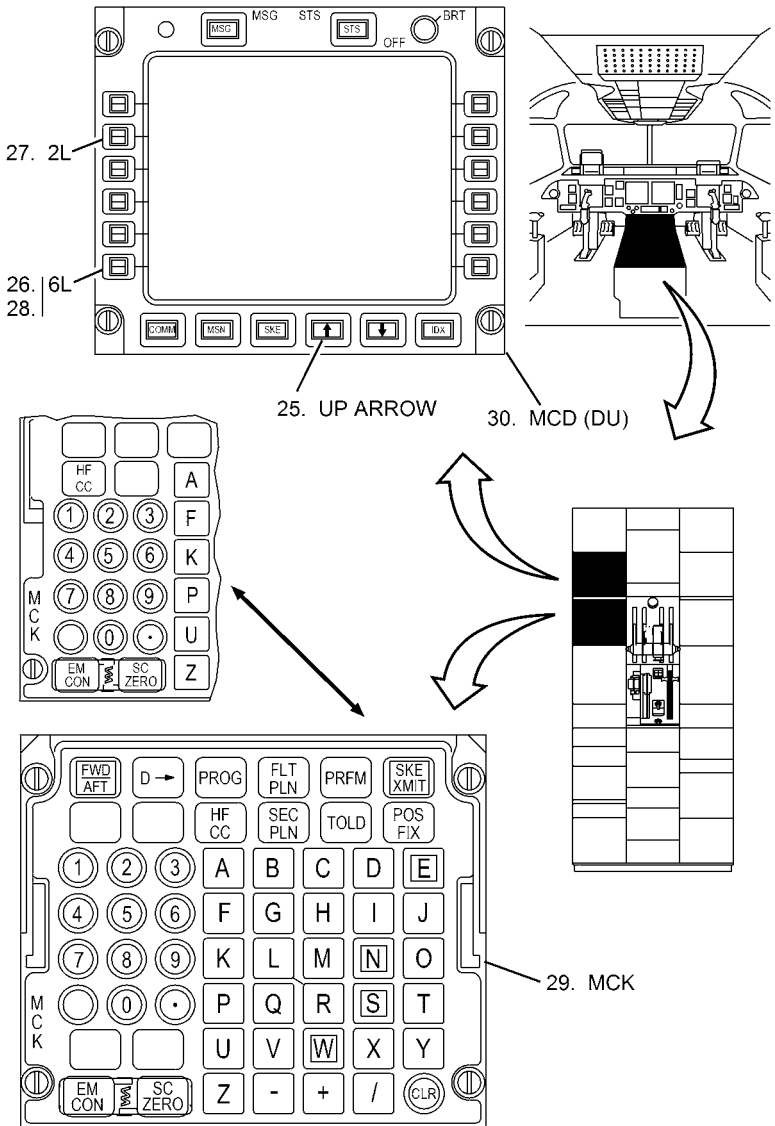
ICN-88277-G2715036-007-01

31. (B) Remove safety wire and loosen bolts on clamp.

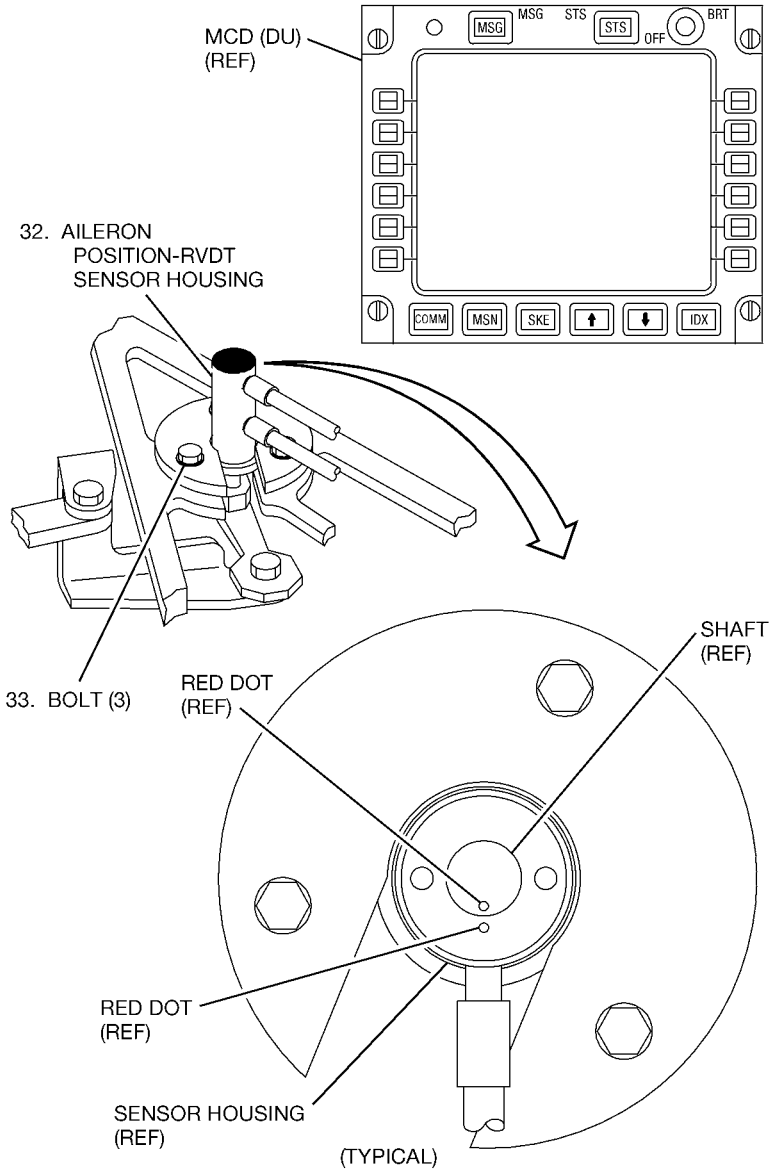31. BOLT (3)

CLAMP
(REF)

(TYPICAL)

ICN-88277-G2715078-002-01

NOTE

The red dot on end of shaft shall be aligned with the red dot on sensor housing within 30 degrees at electrical zero by rotating the sensor housing clockwise or counterclockwise as required.
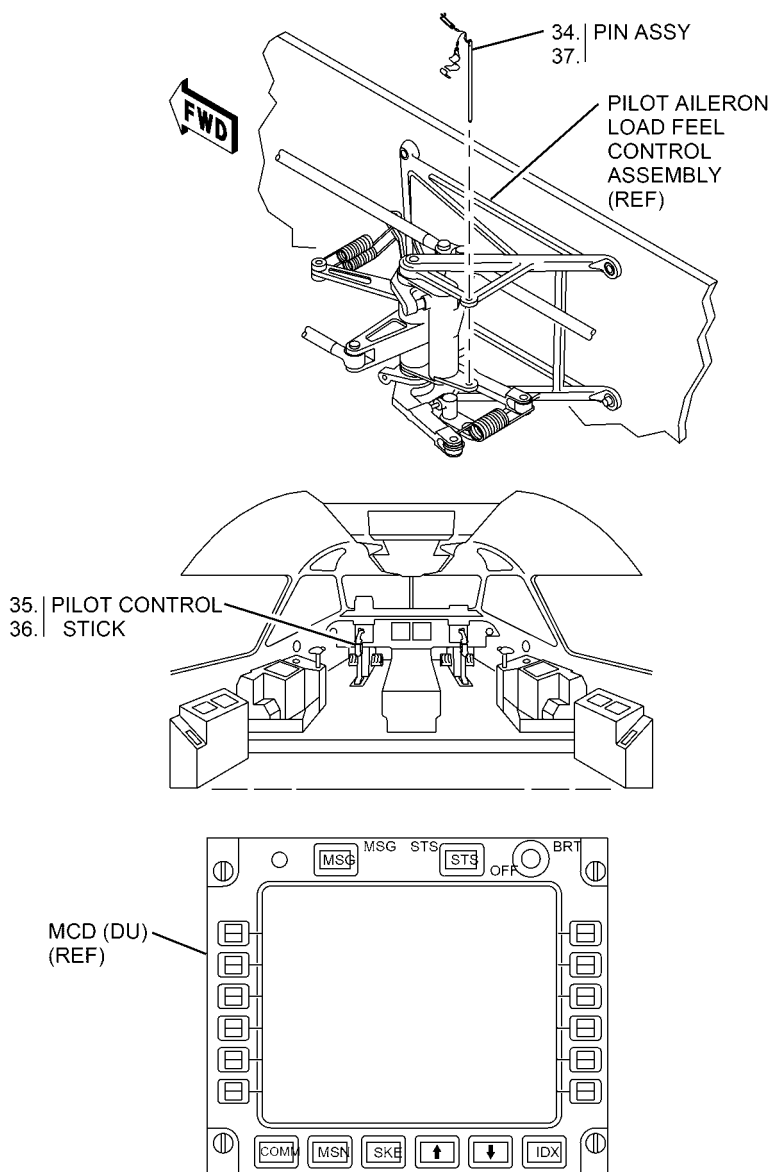
32. (B) Slowly rotate aileron position-Rotary Variable Differential Transducer (RVDT) sensor housing; align red dots.

- **EFCS MEMORY INSPECT** data at address **B948** on **MCD** (**DU**) reads between **FEFF** and **010F**.

33. (B) Tighten bolts.

- **EFCS MEMORY INSPECT** data at address **B948** on **MCD** (**DU**) reads between **FEFF** and **010F**.

MCD (DU)
(REF)

32. AILERON
POSITION-RVDT
SENSOR HOUSING

33. BOLT (3)

RED DOT
(REF)

SHAFT
(REF)

RED DOT
(REF)

SENSOR HOUSING
(REF)

(TYPICAL)

ICN-88277-G2715037-009-01

34. (B) Remove pin assy 5-10 from pilot aileron load feel control assembly.

35. (A) Move pilot control stick full right.

  • **EFCS MEMORY INSPECT** data at address **B948** on **MCD** (**DU**) reads between **5D00** and **659C**.

36. (A) Move control stick full left.

  • **EFCS MEMORY INSPECT** data at address **B948** on **MCD** (**DU**) reads between **A300** and **9A64**.

37. (B) Install pin assy 5-10 in pilot aileron load feel control assembly.

34. | PIN ASSY
37. |

PILOT AILERON
LOAD FEEL
CONTROL
ASSEMBLY
(REF)

FWD

35. | PILOT CONTROL
36. | STICK

MCD (DU)
(REF)

MSG   STS   BRT

MSG   STS

OFF

COMM MSN SKE ↑ ↓ IDX

ICN-88277-G2715048-007-01

38. (B) Secure bolts with safety wire.

39. (B) Remove pin assy from pilot aileron load feel control assembly.

38. BOLT (3)

39. PIN ASSY

PILOT AILERON
LOAD FEEL
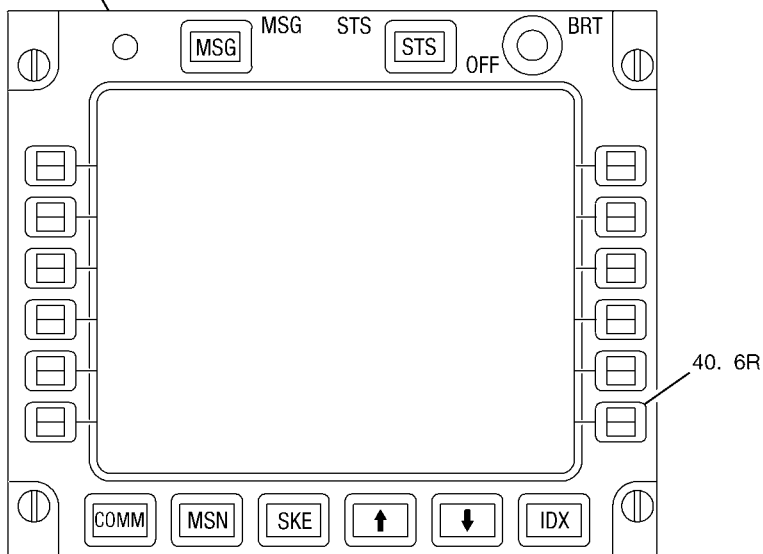CONTROL
ASSEMBLY
(REF)

FWD
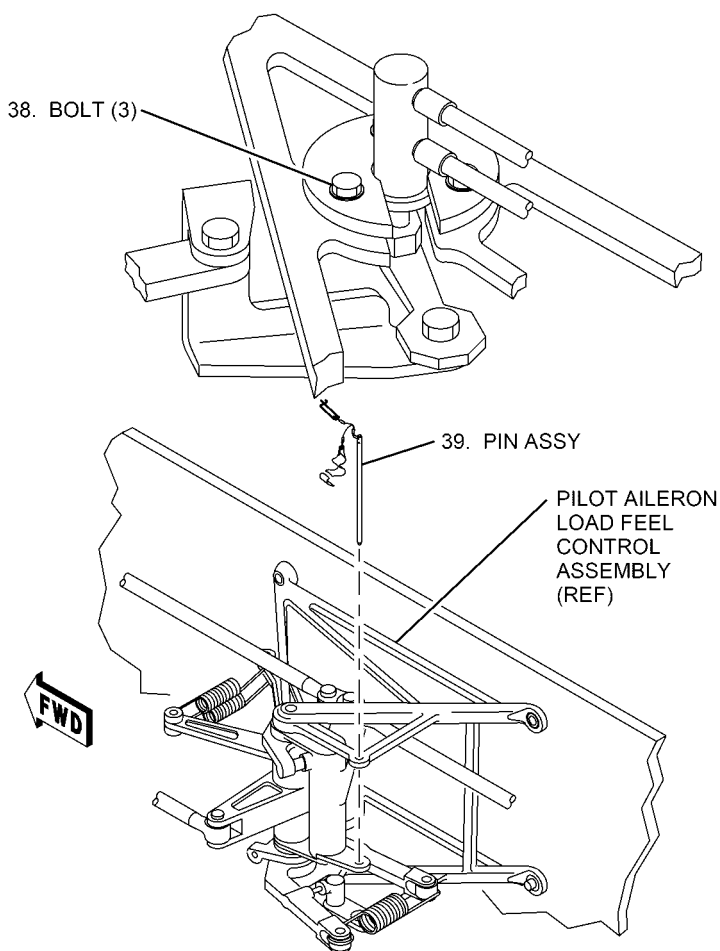
ICN-88277-G2715079-002-01

40. (A) Press 6R LS key.

   - **EFCS MAINT MENU** is displayed on **MCD** (**DU**).

41. Perform control stick sensor assembly operational checkout (22-15-13, task 1-1).

42. Install upper crew compartment floor panels (215BZY), (217AZY), and (213FZM) (53-21-10).
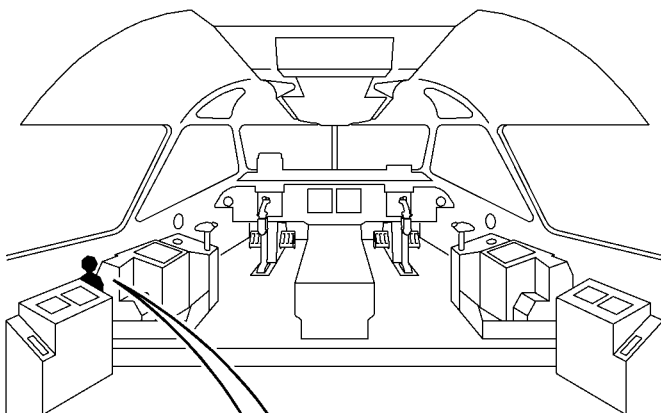
MCD (DU)
(REF)

ICN-88277-G2715080-001-01

5-2. ADJUSTMENT FOR 2715AS002 AND 2715AS004.

1. Review ″Section 1 (General Information)″ of this TO for system general warnings, cautions, and notes.

2. Review task ″Functional Input Conditions″ page for task specific safety conditions.

3. (A) Release latch and remove crew portable oxygen cylinder and regulator.

3. LATCH
   CREW PORTABLE OXYGEN
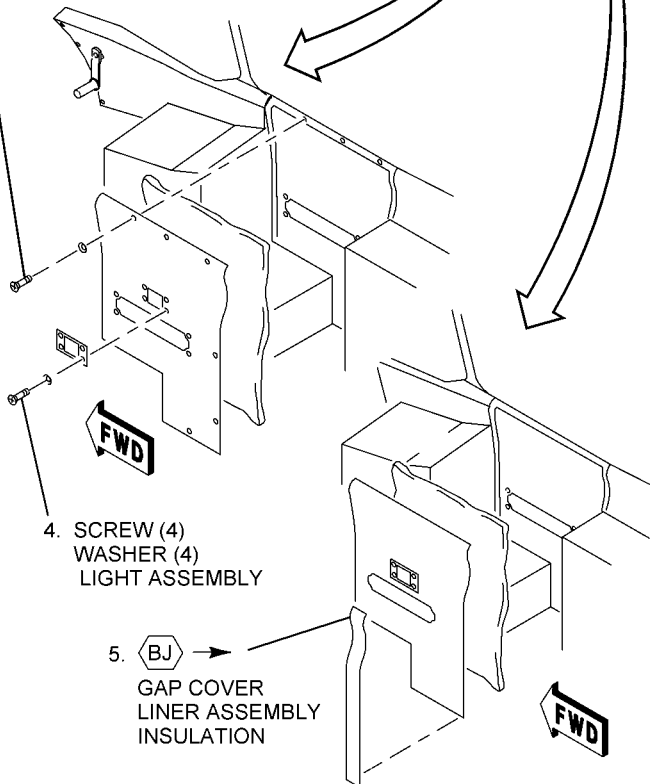   CYLINDER AND REGULATOR
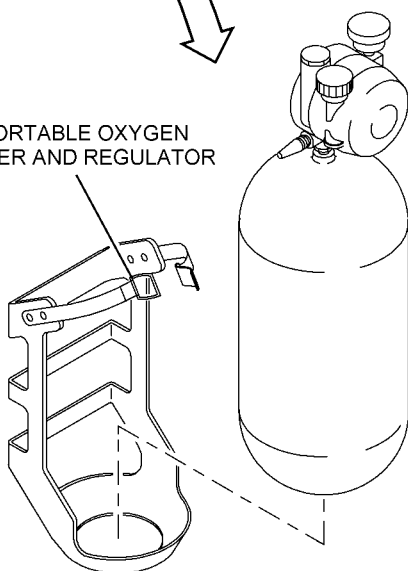
ICN-88277-G2715070-003-01

4.   (A) Remove bolts, washers, and light assembly.

5.   ⟨AA⟩ → ⟨BH⟩ (A) Remove screws, washers, liner assembly (214FZM), and insulation.

5.   ⟨BJ⟩ → (A) Remove gap cover, liner assembly (214FZM), and insulation.

5. AA ➡ BH
   SCREW (6)
   WASHER (6)
   LINER ASSEMBLY
   INSULATION

4. SCREW (4)
   WASHER (4)
   LIGHT ASSEMBLY

5. BJ ➡
   GAP COVER
   LINER ASSEMBLY
   INSULATION

ICN-88277-G2715071-003-01

6. (A) Remove screws from upper crew compartment floor panel (216BZY).

NOTE

Nylon cords are being eliminated by attrition, not all floor panels will have nylon cords.

7. (A) Remove and discard nylon cords.

8. (A) Remove upper crew compartment floor panel.

9. (A) Remove screws from upper crew compartment floor panel (216CZY).

NOTE

Nylon cords are being eliminated by attrition, not all floor panels will have nylon cords.

10. (A) Remove and discard nylon cords.

11. (A) Remove upper crew compartment floor panel.

8. UPPER CREW
   COMPARTMENT
   FLOOR PANEL

7. NYLON CORD (AR)

6. SCREW (23)

9. SCREW (20)

10. NYLON CORD (AR)

11. UPPER CREW
    COMPARTMENT
    FLOOR PANEL

FWD
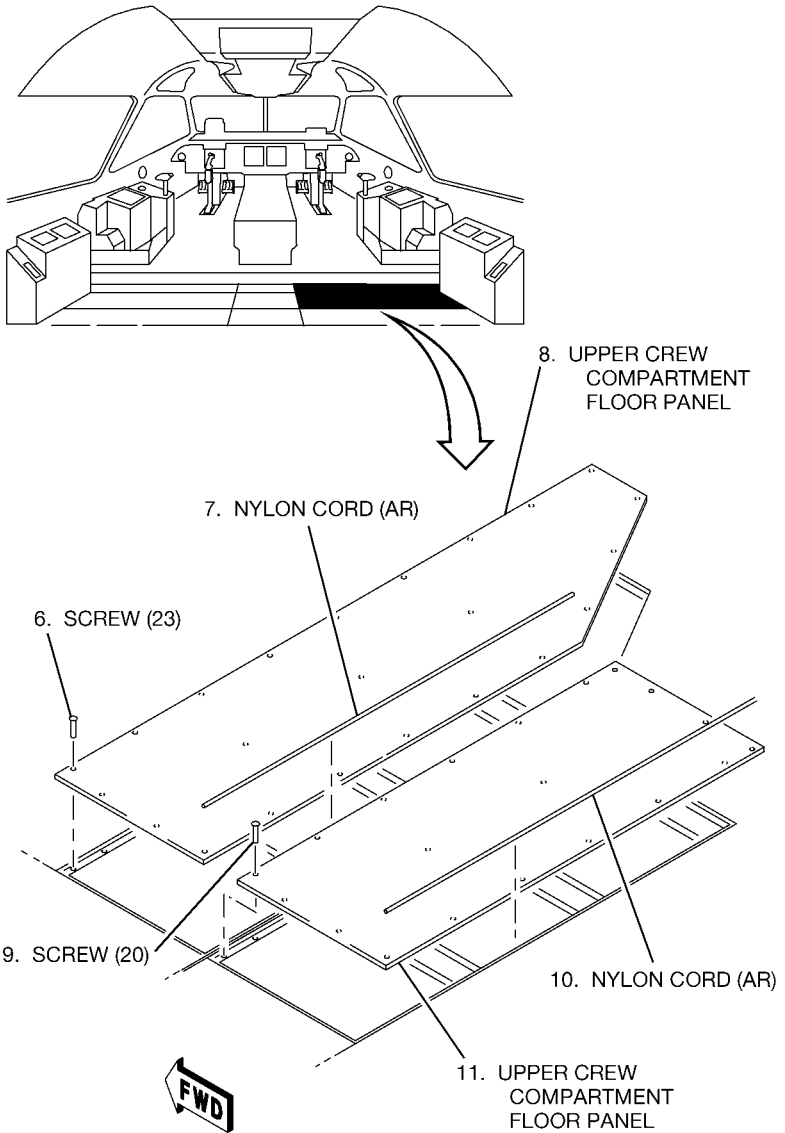
ICN-88277-G2715072-002-01

12.   Operate mission computing system (34-62-02, task 02-1).

<div align="center">

┌─────────────────────┐
│ **WARNING** │
└─────────────────────┘

</div>

All flight control surfaces shall be clear of personnel
and equipment prior to any movement of the surfaces.
Failure to comply may cause injury to personnel or
damage to aircraft.

13.   (A,B) Set pitch/roll trim switch on control stick to **LWD** or **RWD**
until **AIL TRIM** indicator shows **0**.

14.   (A) Set **ROLL** switch on **FCS ACTR** panel to **PART MECH**.
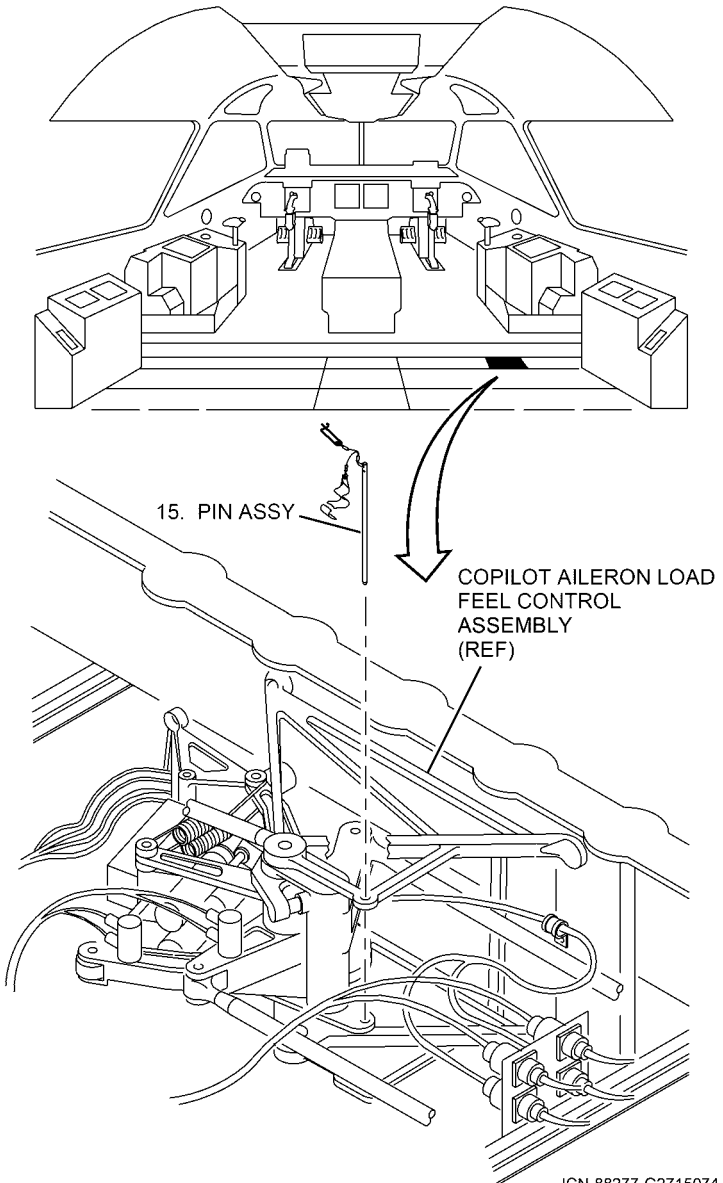
FCS ACTR PANEL
(REF)

14 ROLL

13. PITCH/ROLL
TRIM SWITCH

CONTROL
STICK
(REF)

AIL TRIM
(REF)
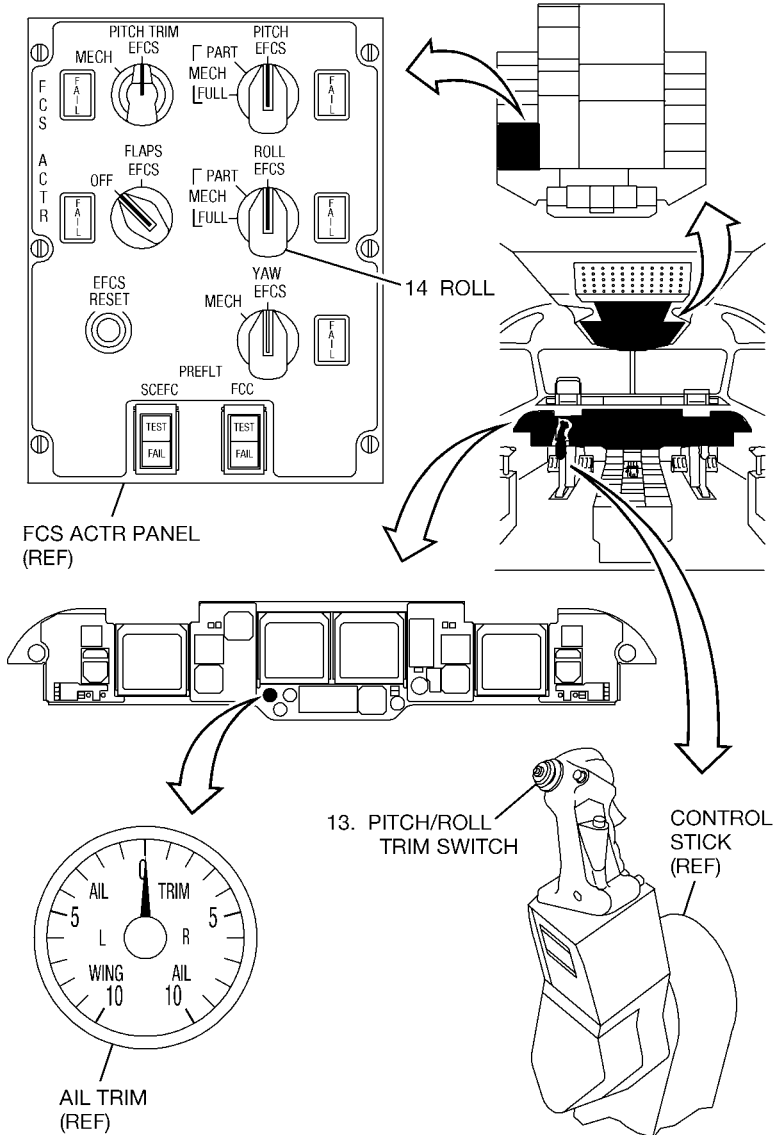
ICN-88277-G2715073-003-01

15. (B) Install pin assy 5-10 in copilot aileron load feel control assembly.
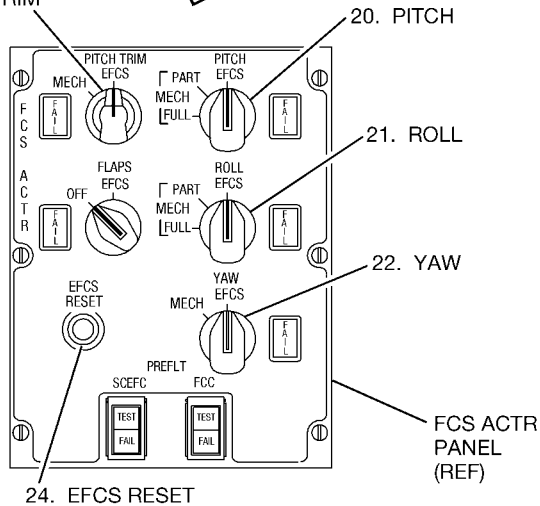
15. PIN ASSY

COPILOT AILERON LOAD
FEEL CONTROL
ASSEMBLY
(REF)

ICN-88277-G2715074-005-01

16. (A) Set **1 IRU** switch on **IRU** panel to **ON**.

17. (A) Set **2 IRU** switch to **ON**.

18. (A) Set **3 IRU** switch on **IRU** panel to **ON**.

19. (A) Set **4 IRU** switch to **ON**.

20. (A) Set **PITCH** switch on **FCS ACTR** panel to **EFCS**.

21. (A) Set **ROLL** switch to **EFCS**.

22. (A) Set **YAW** switch to **EFCS**.

23. (A) Set **PITCH TRIM** switch to **EFCS**.

24. (A) Press **EFCS RESET** button.

IRU PANEL
(REF)

IRU PANEL
(REF)

1 IRU
ON
OFF

2 IRU
ON
OFF

I
R
U

PULL TO TURN

3 IRU
ON
OFF

4 IRU
ON
OFF

I
R
U

PULL TO TURN

16. 1 IRU   17. 2 IRU   18. 3 IRU   19. 4 IRU

23. PITCH TRIM

20. PITCH

PITCH TRIM
EFCS
MECH

F
C
S

FAIL

PITCH
EFCS
PART
MECH
FULL

FAIL

21. ROLL

FLAPS
EFCS
OFF

A
C
T
R

FAIL

ROLL
EFCS
PART
MECH
FULL

FAIL

22. YAW

EFCS
RESET

YAW
EFCS
MECH

FAIL

PREFLT
SCEFC   FCC

TEST
FAIL

TEST
FAIL

FCS ACTR
PANEL
(REF)

24. EFCS RESET
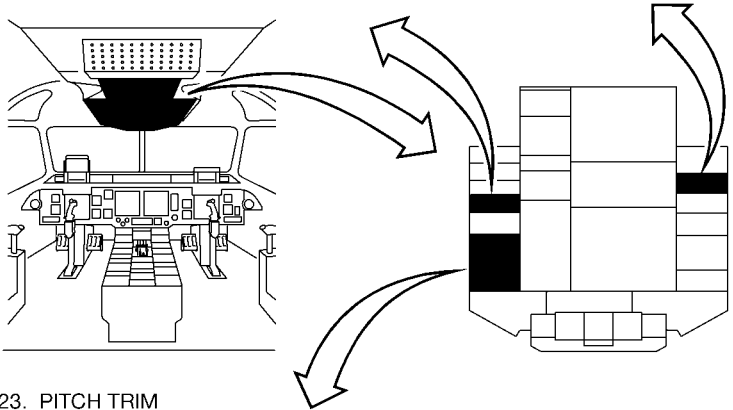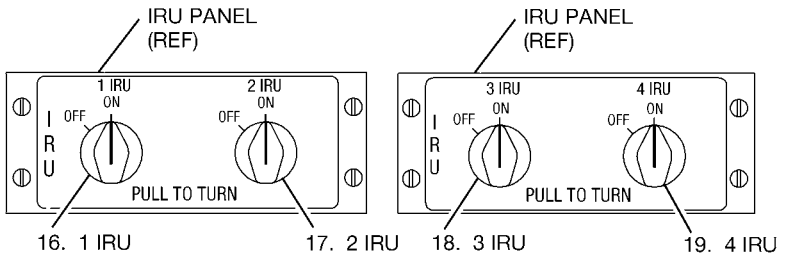
ICN-88277-G2715049-005-01

27-15-10-5
2-233

25. (A) Press up arrow key on **MCD** (**DU**).

  • **MSN INDEX 2** is displayed.

26. (A) Press 6L Line Select (LS) key.

  • **MAINTENANCE MENU** is displayed.

27. (A) Press 2L LS key.

  • **EFCS MAINT MENU** is displayed.

28. (A) Press 6L LS key.

  • **EFCS MEMORY INSPECT** is displayed.

29. (A) Enter 1B948 on **MCK**.

  • **EFCS MEMORY INSPECT** is displayed with address/data.

30. (A) Read memory inspect data for address B948 on **MCD** (**DU**) as follows:
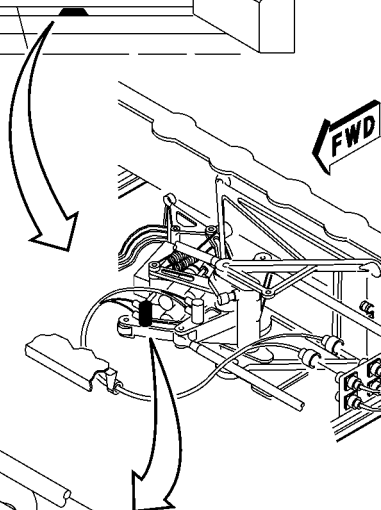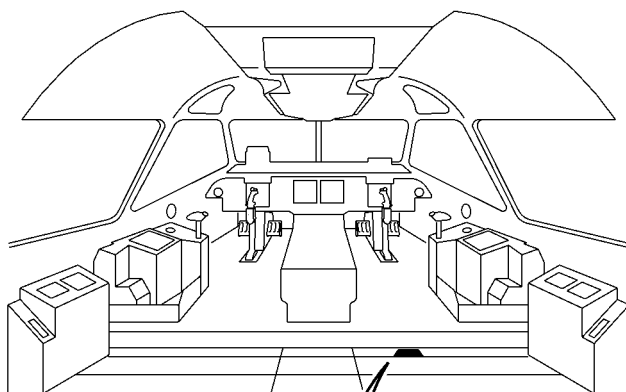
REF DES	FCC NO.
2715AS002	3
2715AS004	4

27. 2L

26. 6L
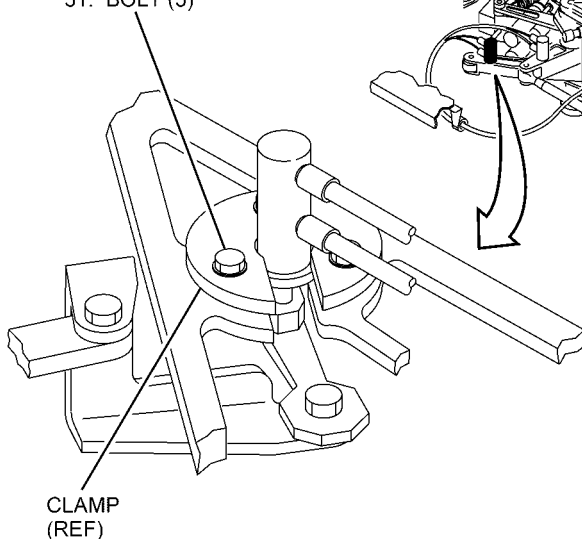28.

25. UP ARROW

30. MCD (DU)

29. MCK
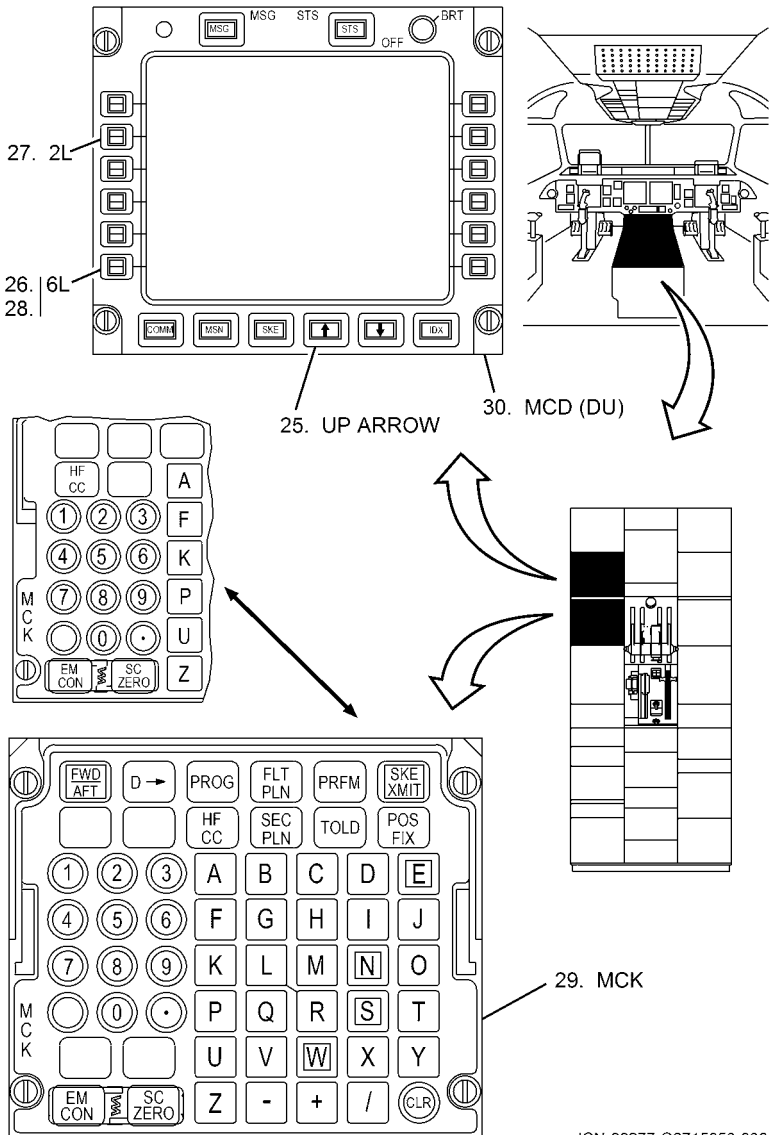
ICN-88277-G2715050-006-01

31.   (B) Remove safety wire and loosen bolts on clamp.

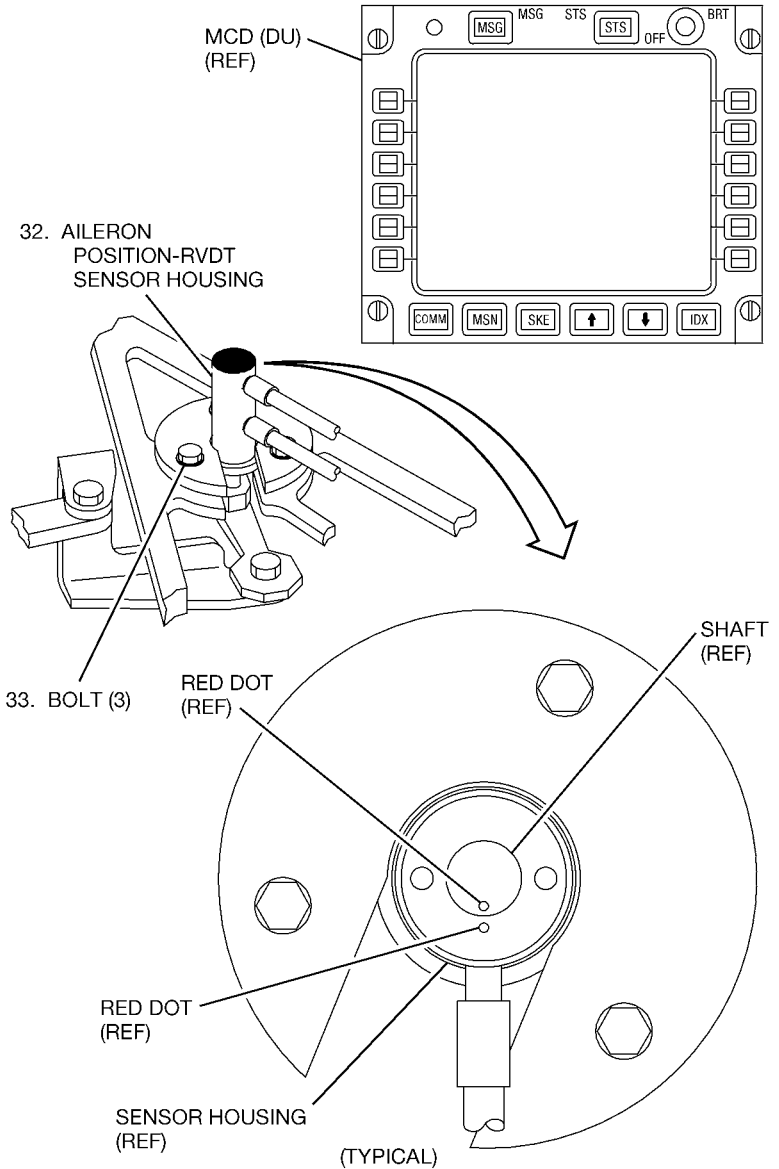31. BOLT (3)

FWD

CLAMP
(REF)
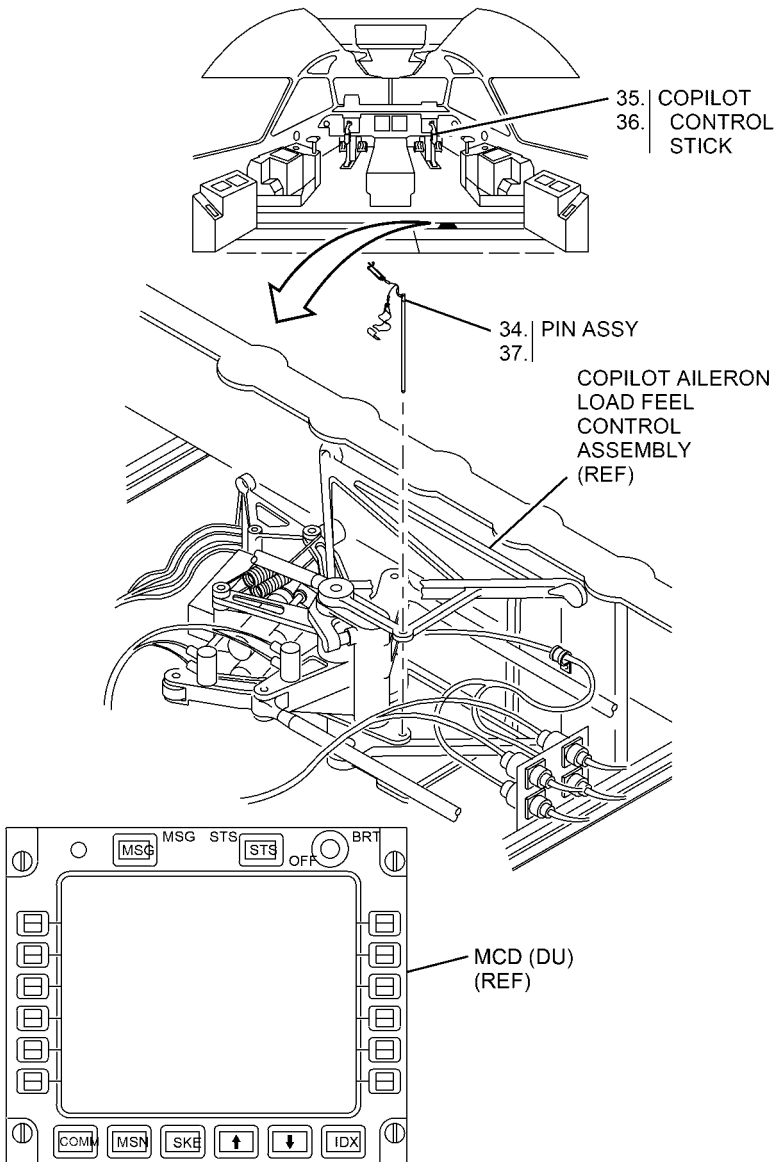
(TYPICAL)

ICN-88277-G2715081-003-01

NOTE

The red dot on end of shaft shall be aligned with the
red dot on sensor housing within 30 degrees at
electrical zero by rotating the sensor housing clockwise
or counterclockwise as required.

32. (B) Slowly rotate aileron position-Rotary Variable Differential
Transducer (RVDT) sensor housing; align red dots.

- **EFCS MEMORY INSPECT** data at address **B948** on **MCD**
(**DU**) reads between **FEFF** and **010F**.

33. (B) Tighten bolts.

- **EFCS MEMORY INSPECT** data at address **B948** on **MCD**
(**DU**) reads between **FEFF** and **010F**.

MCD (DU)
(REF)

MSG   MSG   STS   STS   BRT
                              OFF

COMM   MSN   SKE   ↑   ↓   IDX

32. AILERON
     POSITION-RVDT
     SENSOR HOUSING

33. BOLT (3)

RED DOT
(REF)

SHAFT
(REF)

RED DOT
(REF)

SENSOR HOUSING
(REF)
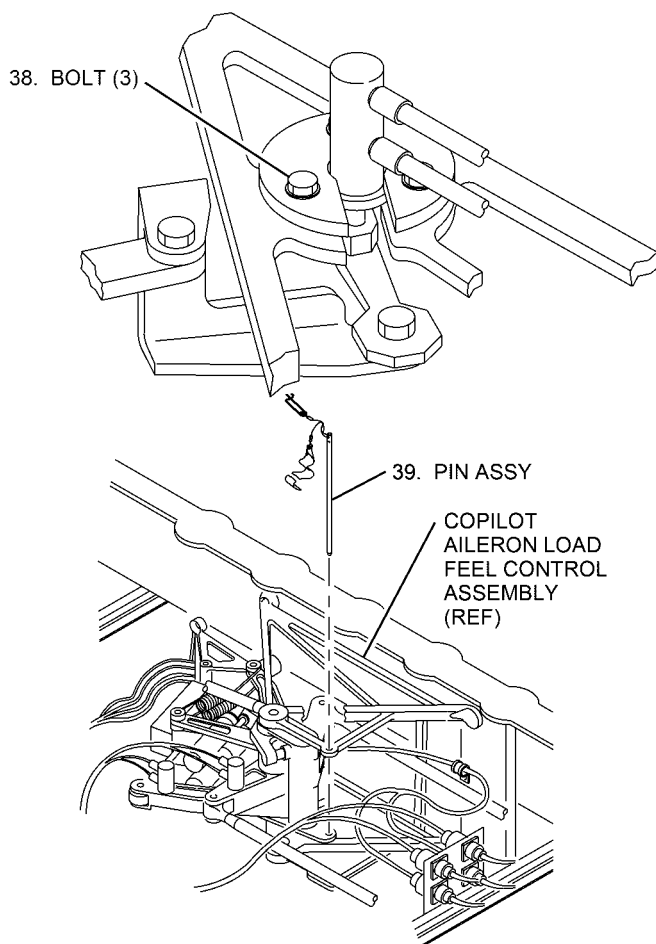
(TYPICAL)

ICN-88277-G2715051-007-01

34. (B) Remove pin assy 5-10 from copilot aileron load feel control assembly.

35. (A) Move copilot control stick full right.

   - **EFCS MEMORY INSPECT** data at address **B948** on **MCD** (**DU**) reads between **4894** and **659C**.

36. (A) Move control stick full left.

   - **EFCS MEMORY INSPECT** data at address **B948** on **MCD** (**DU**) reads between **B76C** and **9A64**.

37. (B) Install pin assy 5-10 in copilot aileron load feel control assembly.

35. | COPILOT
36. | CONTROL
STICK

34. | PIN ASSY
37. |

COPILOT AILERON
LOAD FEEL
CONTROL
ASSEMBLY
(REF)

MSG   STS   BRT

MSG   STS
OFF

MCD (DU)
(REF)

COMM   MSN   SKE   ↑   ↓   IDX

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38. (B) Secure bolts with safety wire.

39. (B) Remove pin assy from copilot aileron load feel control assembly.

38. BOLT (3)

39. PIN ASSY

COPILOT
AILERON LOAD
FEEL CONTROL
ASSEMBLY
(REF)

(TYPICAL)

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40. (A) Press 6R LS key.

    - **EFCS MAINT MENU** is displayed on **MCD** (**DU**).

41. Perform control stick sensor assembly operational checkout (22-15-13, task 1-1).

42. Perform copilot aileron position sensor maintenance built-in test (task 1-1).

43. Install upper crew compartment floor panels (217AZY) and (216BZY) (53-21-10).

MCD (DU)
(REF)

MSG MSG STS STS BRT OFF

40. 6R

COMM MSN SKE ↑ ↓ IDX
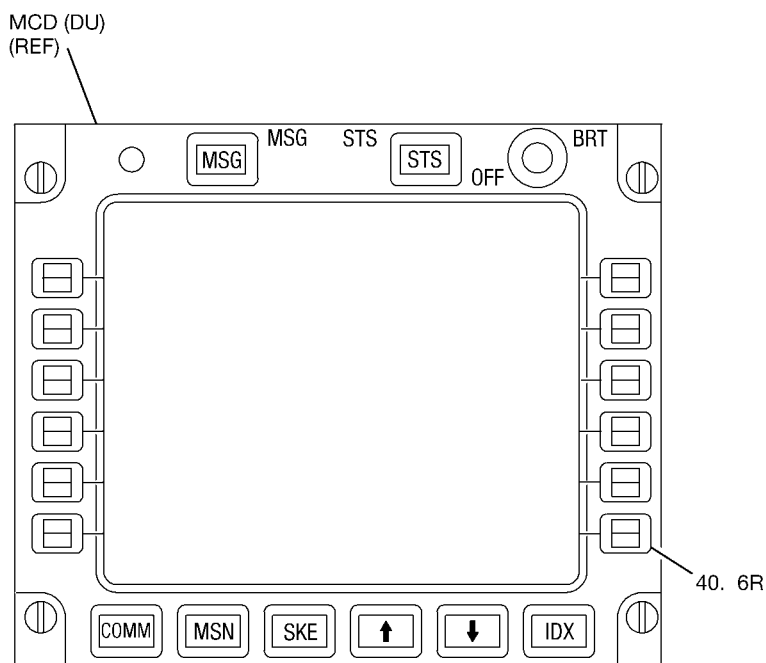
(TYPICAL)

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