

**TEMPORARY REVISION NO. 02**  
**To: EA550 Quick Reference Handbook**  
**EMERGENCY PROCEDURES**

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This Temporary Revision affects the QRH Part Number 06-123842, Revision "Original Issue", dated June 2, 2014. Remove this TR when Revision 01 is inserted. Record this TR insertion (or removal) on the Log of Temporary Revisions.

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## ALPHABETICAL INDEX TO CAS MESSAGES

The table below is an alphabetical index to the Crew Alerting System messages discussed in the EMERGENCY PROCEDURES.

CAS Message	TAB
ABS "ARMED" Lamp not ON with Gear Down (in air)	L GEAR
ABS "INOP" Light Flashing or ON	L GEAR
ACP FAIL	AV IN
ADC 1(2) FAIL	AV IN
ADC 3 FAIL	AV IN
ADS-B 1(2) FAIL	AV IN
AHRS 1(2) FAIL	AV IN
AILERON TRIM FAIL	FLT C
AIR CONDITIONING FAIL	ENV
AIR SOURCE SELECTOR	TOCFG
AIR SOURCE SW FAULT	ENV
AIRSPEED DISAGREE	AV IN
ALL INTERRUPT ACTIVE	TOCFG
ALT (on PFD)	AV IN
ALTITUDE DISAGREE	AV IN
AP DISC (on PFD)	A FLT
AP PITCH MISTRIM	A FLT
AP ROLL MISTRIM	A FLT
AP/FD MODE CHANGE	A FLT
APR DISARMED	TOCFG
ATT (on PFD)	AV IN
AT FAIL	A FLT
ATTITUDE DISAGREE	AV IN
AUTO BALANCE FAIL	FUEL
AUTOPILOT FAIL	A FLT
AUX PROBE HEAT FAIL	ICE
AVGAS DETECTED	FUEL

<b>Smoke or Fumes</b>		<b>(Cont'd)</b>
<b><i>If Smoke Appears to Be Electrical:</i></b>		
<div style="border: 1px dashed black; padding: 5px; display: inline-block;"><b>CAUTION</b></div>		
<p><b>Ensure that the left PFD is displaying attitude and air data prior to executing the following steps for right bus isolation.</b></p>		
<ol style="list-style-type: none"> <li>1. BUS TIE Switch ..... OPEN</li> <li>2. R GEN Switch..... OFF</li> <li>3. START BATT Switch..... OFF</li> </ol>		
<p>Functions <b>INOPERATIVE</b> with START BATT Switch OFF. (Display may not indicate actual system state, &amp; "---" indicate other inop systems.)</p>		
<ul style="list-style-type: none"> <li>• R PFD</li> <li>• MFD</li> <li>• L SDU</li> <li>• R SDU (Degraded to DG Mode, if installed)</li> <li>• Pitch Trim will not have full authority and pitch asymmetry may occur when pitch is trimmed.</li> <li>• Rudder Trim</li> <li>• Flaps</li> <li>• Stick Pusher</li> <li>• Autopilot</li> <li>• Yaw Damper</li> <li>• COM 2</li> <li>• NAV 2</li> <li>• GPS 2</li> </ul>	<ul style="list-style-type: none"> <li>• Transponder 2</li> <li>• ADS-B 2</li> <li>• Crew Intercom</li> <li>• R Keyboard (if installed)</li> <li>• R Eng Ignition</li> <li>• R Eng Fuel Shutoff Valve cannot be shut off</li> <li>• R Eng Fire Extinguisher</li> <li>• R Electric Fuel Pump</li> <li>• R AIR SOURCE failed ON</li> <li>• Cockpit/Cabin temperature control (degraded)</li> <li>• R Eng Anti-Ice failed ON</li> <li>• Defog</li> <li>• Cabin Power Outlets</li> <li>• R Windshield Heat</li> <li>• Autothrottle</li> <li>• ABS</li> </ul>	
<b><i>If Smoke clears:</i></b>		
--- END ---		
<b><i>If Smoke does not clear:</i></b>		
<ol style="list-style-type: none"> <li>1. START BATT Switch..... ON</li> <li>2. R GEN Switch.....AUTO</li> </ol>		
<div style="border: 1px dashed black; padding: 5px; display: inline-block;"><b>CAUTION</b></div>		
<p><b>Ensure that the right PFD is displaying attitude and air data prior to executing the following steps for left bus isolation.</b></p>		

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<b>Smoke or Fumes</b>		<b>(Cont'd)</b>
3. L GEN Switch .....		OFF
4. SYS BATT Switch .....		OFF
Functions <b>INOPERATIVE</b> with SYS BATT Switch OFF. (Display may not indicate actual system state, & "---" indicate other inop systems.)		
<ul style="list-style-type: none"> <li>• L PFD</li> <li>• R SDU</li> <li>• Pitch Trim will not have full authority and pitch asymmetry may occur when pitch is trimmed.</li> <li>• Aileron Trim</li> <li>• Landing Gear</li> <li>• Stick Pusher</li> <li>• Autopilot</li> <li>• Yaw Damper</li> <li>• COM 1</li> <li>• NAV 1</li> <li>• GPS 1</li> <li>• GPS 2</li> <li>• Transponder 1</li> <li>• ADS-B 1</li> <li>• ADS-B 2</li> </ul>	<ul style="list-style-type: none"> <li>• ABS</li> <li>• L Keyboard (if installed)</li> <li>• L Eng Ignition</li> <li>• L Eng Fuel Shutoff Valve failed ON</li> <li>• L Eng Fire Det. &amp; Ext</li> <li>• L Electric Fuel Pump</li> <li>• START &amp; SYSTEM BATT Heaters</li> <li>• L AIR SOURCE failed ON</li> <li>• CABIN DUMP switch</li> <li>• Cockpit/Cabin temperature control (degraded)</li> <li>• L Eng Anti-Ice failed ON</li> <li>• WING Deice</li> <li>• Strobe Lights</li> <li>• L Windshield Heat</li> <li>• Autothrottle</li> <li>• Pitot/AOA Auxiliary Heaters</li> </ul>	
<p><b>If Smoke Clears:</b> -- END --</p> <p><b>If Smoke Does Not Clear:</b></p> <p>1. SYS BATT Switch ..... ON</p> <p>2. L GEN Switch ..... AUTO</p> <p>3. BUS TIE Switch ..... AUTO</p> <p><b>If Bleed Air Was Not Initially Suspected:</b></p> <p>1. Go to "If Smoke Appears to Be Bleed Air Related:" at the beginning of this procedure.</p>		

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ADS-B 1(2) FAIL	
	<b>ADS-B 1 FAIL or ADS-B 2 FAIL</b>
Active transponder in the transmit mode fails to receive the position data (ADS-B function is unavailable).	
1. Advise ATC of loss of ADS-B functionality.	
<b>NOTE</b>	
Switching to XPDR 2, to regain ADS-B functionality, results in RVSM requirements no longer met.	

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<b>XPDR 1(2) FAIL</b>	
<b>XPDR 1 FAIL or XPDR 2 FAIL</b>	
Transponder 1 or 2 has failed. The diversity operation of a diversity transponder (DXPDR), if installed, is not operational. The transponder may still operate using the upper antenna only. ADS-B function of a failed transponder is unavailable.	
1. Select opposite XPDR. <b>If XPDR 1 Fail:</b> 1. LEFT PFD & CNS1 (CB - Left inst. Panel) ..... Reset If Tripped 2. XPDR 1/KYBD 1 (CB - Pilot Armrest) ..... Reset If Tripped <b>If XPDR 1 Remains Failed:</b> 1. RVSM equipment requirements no longer met. Advise ATC. <b>If XPDR 2 Fail:</b> 1. R PFD CNS2 ACP (ECB Page - AVIONICS)..... Reset If Tripped 2. XPDR 2 (CB - Copilot Armrest) ..... Reset If Tripped	

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BATTERY POWER ONLY						Cont'd
	Final Approach Speed - KEAS					NGEM-03-1A
Flap Position	ICE PROT - OFF or ENG		ICE PROT - ENG/WING			*ADD (%) to Landing Distance
	6000 lb	5500 lb	5000 lb	4500 lb	4000 lb	
T/O	107 (134)	103 (128)	98 (122)	93 (116)	87 (109)	+30% (+30%)
LDG	98 (123)	93 (117)	89 (112)	85 (106)	80 (100)	-- --

\*Use landing distance from the appropriate ICE PROT selection table  
Speeds may exceed Maximum Tire Speed but may be used in emergencies

5. V<sub>REF</sub> (OPS Page) ..... Enter Final Approach Speed
6. Approach Setup and Brief..... Complete
7. Airspeed in Coordinated Straight Flight ..... 195 to 200 KEAS
8. EMERGENCY GEAR RELEASE Handle ..... PULL  
(Pull in one continuous motion until latched)
9. GEAR Indication ..... Verify Three Green  
(Do not retract gear after successful extension)

**NOTES**

- If gear fails to fully extend, decrease airspeed to 180 KEAS (VO) and apply G force in attempt to extend gear.
- LANDING GEAR FAIL CAS message will be displayed; no action required.

10. EMERGENCY GEAR RELEASE Handle ..... PUSH Fully In
11. GEAR Handle ..... DOWN
12. FLAPS ..... LDG
13. Airspeed..... V<sub>REF</sub>

Functions INOPERATIVE when on battery power only: (Display may not indicate actual system state, & "---" indicate other inop systems.)

<ul style="list-style-type: none"> <li>• R PFD</li> <li>• ADC 3</li> <li>• Stick Pusher</li> <li>• Landing Gear</li> <li>• Yaw Damper</li> <li>• COM 2</li> <li>• NAV 2</li> <li>• GPS 2</li> <li>• Transponder 2/ADS-B 2 OUT</li> <li>• Autopilot</li> <li>• Autothrottle</li> <li>• Pitot/AOA Auxiliary Heaters</li> </ul>	<ul style="list-style-type: none"> <li>• Sys Battery Heater</li> <li>• Start Battery Heater</li> <li>• Air Cond System</li> <li>• Windshield Heat</li> <li>• R Landing Light</li> <li>• Taxi Lights</li> <li>• Strobe Lights</li> <li>• Position Lights</li> <li>• Beacon Light</li> <li>• Weather Radar</li> <li>• ABS</li> </ul>
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<b>BATTERY POWER ONLY</b>		<i>Cont'd</i>
<b>AUTO LOAD SHED</b>		
THESE ARE THE AVAILABLE FUNCTIONS AFTER LOAD SHED:		
<ul style="list-style-type: none"> <li>● L PFD</li> <li>● MFD*</li> <li>● L SDU</li> <li>● ADC 1 or 2</li> <li>● AHRS 1 or 2</li> <li>● Pitch Trim</li> <li>● Aileron Trim</li> <li>● Rudder Trim</li> <li>● Flaps</li> <li>● Landing Gear Emergency Extension</li> <li>● Stall Warning</li> <li>● COM 1</li> <li>● NAV 1</li> <li>● GPS 1</li> <li>● Transponder 1</li> <li>● ADS-B 1</li> <li>● L &amp; R Eng FADEC</li> </ul>	<ul style="list-style-type: none"> <li>● L &amp; R Eng Fire Extinguisher</li> <li>● ECB Control</li> <li>● L &amp; R Generator Control</li> <li>● Oxygen</li> <li>● AIR SOURCE</li> <li>● Cabin Dump</li> <li>● Pitot/AOA Heat</li> <li>● Static Heat*</li> <li>● Eng Anti-Ice</li> <li>● Wing Deice</li> <li>● L Landing Light</li> <li>● Wing Inspection Light</li> <li>● Master Dim</li> <li>● Dome Light</li> <li>● Map Lights</li> <li>● Cabin Lights</li> </ul>	
* Lost after manual load shed.		
<b>NOTE</b>		
After Emergency Gear Extension, inspect gear according to the <i>Aircraft Maintenance Manual</i> prior to the next flight.		

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<b>AUX PROBE HEAT FAIL (Advisory)</b>	
	<b>AUX PROBE HEAT FAIL</b>
(If Pitot/AOA probe Auxiliary Heaters installed) Pitot/AOA probe Auxiliary Heater system fail.	
Potential exists for airspeed errors, continue to monitor airspeed.	