aircraft equipped with EPIC software load 4.3, 4.4, 4.5, 4.6, or 4.7. Therefore, following a possible failure on one FGCS channel during a given flight, such a failure condition will remain undetected or latent in subsequent flights. If another failure occurs on the second FGCS channel, the result may be a hardover command by the autopilot.

An unexpected hardover command may cause a sudden roll, pitch, or yaw movement, which could result in reduced controllability of the airplane. The MCAI mandates a functional check of the FGCS channels engagement and installation of an upgrade to the PRIMUS EPIC Field-Loadable Software. Corrective actions include replacing the actuator input-output processor, if necessary.

Actions and Compliance

(f) Unless already done, do the following actions.

(1) Within 300 flight hours after the effective date of this AD, do a functional check of the FGCS channels engagement, in accordance with EMBRAER Service Bulletin 170–22–0003 or Service Bulletin 190–22–0002, both Revision 01, both dated November 5, 2007, as applicable. Repeat the functional check thereafter at intervals not to exceed 600 flight hours, until the terminating action described by paragraph (f)(2) of this AD has been done. If any malfunction of the FGCS is discovered during any functional check required by this paragraph, before further flight, do all applicable replacements of the actuator input-output processor in accordance with the applicable service bulletin.

Note 1: For the purpose of this AD, a functional check is: ''A quantitative check to determine if one or more functions of an item perform within specified limits.''

(2) Within 8 months after the effective date of this AD, install PRIMUS EPIC Field-Loadable Software Version 19.3 or higher, in accordance with EMBRAER Service Bulletin 170–31–0019, Revision 01, dated June 25, 2007; or Service Bulletin 190–31–0009, Revision 02, dated June 29, 2007; as applicable. Doing this installation ends the repetitive functional checks required by paragraph (f)(1) of this AD.

(3) Any functional check done before the effective date of this AD in accordance with EMBRAER Service Bulletin 170–22–0003 or 190–22–0002, both dated November 9, 2006, as applicable, is considered acceptable for compliance with the requirements of paragraph (f)(1) of this AD.

FAA AD Differences

Note 2: This AD differs from the MCAI and/ or service information as follows: No differences.

Other FAA AD Provisions

(g) The following provisions also apply to this AD:

(1) *Alternative Methods of Compliance (AMOCs):* The Manager, International Branch, ANM–116, Transport Airplane Directorate, FAA, has the authority to approve AMOCs for this AD, if requested using the procedures found in 14 CFR 39.19. Send information to ATTN: Todd Thompson, Aerospace Engineer, International Branch, ANM–116, Transport Airplane Directorate, FAA, 1601 Lind Avenue, SW., Renton, Washington 98057–3356; telephone (425) 227–1175; fax (425) 227–1149. Before using any approved AMOC on any airplane to which the AMOC applies, notify your appropriate principal inspector (PI) in the FAA Flight Standards District Office (FSDO), or lacking a PI, your local FSDO.

(2) *Airworthy Product:* For any requirement in this AD to obtain corrective actions from a manufacturer or other source, use these actions if they are FAA-approved. Corrective actions are considered FAA-approved if they are approved by the State of Design Authority (or their delegated agent). You are required to assure the product is airworthy before it is returned to service.

(3) *Reporting Requirements:* For any reporting requirement in this AD, under the provisions of the Paperwork Reduction Act, the Office of Management and Budget (OMB) has approved the information collection requirements and has assigned OMB Control Number 2120–0056.

Related Information

(h) Refer to MCAI Brazilian Airworthiness Directives 2006–11–02R2 and 2006–11–03R2, both effective October 30, 2007; EMBRAER Service Bulletins 170–22–0003 and 190–22–0002, both Revision 01, both dated November 5, 2007; EMBRAER Service Bulletin 170–31–0019, Revision 01, dated June 25, 2007; and EMBRAER Service Bulletin 190–31–0009, Revision 02, dated June 29, 2007; for related information.

Issued in Renton, Washington, on April 3, 2008.

Dionne Palermo,

Acting Manager, Transport Airplane Directorate, Aircraft Certification Service.

[FR Doc. E8–7667 Filed 4–10–08; 8:45 am]

BILLING CODE 4910–13–P

DEPARTMENT OF TRANSPORTATION

Federal Aviation Administration

14 CFR Part 39

[Docket No. FAA–2007–0051; Directorate Identifier 2007–NE–37–AD]

RIN 2120–AA64

Airworthiness Directives; Teledyne Continental Motors (TCM) IO–520, TSIO–520, and IO–550 Series Engines with Superior Air Parts, Inc. (SAP) Cylinder Assemblies Installed

AGENCY: Federal Aviation Administration (FAA), Department of Transportation (DOT).

ACTION: Notice of proposed rulemaking (NPRM).

SUMMARY: The FAA proposes to adopt a new airworthiness directive (AD) for certain TCM IO–520, TSIO–520, and IO–550 reciprocating engines with certain SAP cylinder assemblies installed. This proposed AD would require initial and repetitive inspections and compression tests to detect cracks in those cylinders with more than 750 flight hours time-in-service (TIS). This proposed AD results from reports of cracks in the area of the exhaust valve and separation of cylinder heads from the barrels of SAP cylinder assemblies with certain part numbers. We are proposing this AD to prevent separation of the cylinder head, which could result in immediate loss of engine power, possible structural damage to the engine, and possible fire in the engine compartment.

DATES: We must receive any comments on this proposed AD by June 10, 2008.

ADDRESSES: Use one of the following addresses to comment on this proposed AD.

- *Federal eRulemaking Portal:* Go to *http://www.regulations.gov* and follow the instructions for sending your comments electronically.
- *Mail:* Docket Management Facility, U.S. Department of Transportation, 1200 New Jersey Avenue SE., West Building Ground Floor, Room W12–140, Washington, DC 20590–0001.
- *Hand Delivery:* Deliver to Mail address above between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays.
- *Fax:* (202) 493–2251.

FOR FURTHER INFORMATION CONTACT: Tausif Butt, Aerospace Engineer, Special Certification Office, FAA, Rotorcraft Directorate, 2601 Meacham Blvd, Fort Worth, TX 76137–4298; e-mail: *tausif.butt@faa.gov*; telephone (817) 222–5195; fax (817) 222–5785.

SUPPLEMENTARY INFORMATION:

Comments Invited

We invite you to send us any written relevant data, views, or arguments regarding this proposal. Send your comments to an address listed under **ADDRESSES**. Include ''Docket No. FAA–2007–0051; Directorate Identifier 2007–NE–37–AD'' in the subject line of your comments. We specifically invite comments on the overall regulatory, economic, environmental, and energy aspects of the proposed AD. We will consider all comments received by the closing date and may amend the proposed AD in light of those comments.

We will post all comments we receive, without change, to *http://www.regulations.gov,* including any personal information you provide. We will also post a report summarizing each substantive verbal contact with FAA personnel concerning this proposed AD.

Using the search function of the Web site, anyone can find and read the comments in any of our dockets, including, if provided, the name of the individual who sent the comment (or signed the comment on behalf of an association, business, labor union, etc.). You may review the DOT's complete Privacy Act Statement in the **Federal Register** published on April 11, 2000 (65 FR 19477–78).

Examining the AD Docket

You may examine the AD docket on the Internet at *http://www.regulations.gov;* or in person at the Docket Operations office between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays. The AD docket contains this proposed AD, the regulatory evaluation, any comments received, and other information. The street address for the Docket Operations office (telephone (800) 647–5527) is the same as the Mail address provided in the **ADDRESSES** section. Comments will be available in the AD docket shortly after receipt.

Discussion

Superior Air Parts and operators in the field have reported 24 SAP cylinder assemblies with cracks or separation in the area of the exhaust valves. Some instances resulted in forced landings of the airplanes. The reported failures were cylinder assemblies in the naturally-aspirated and turbocharged engines. Most of the failures were on airplanes that have a high ratio of takeoffs and landings per flight hour. Most of the failures also occurred on airplanes that are operated predominantly at low altitude. SAP first informed us on July 12, 2006, that at least 14 SAP investment cast cylinder assemblies, P/Ns SA52000–A1, SA52000–A20P, SA52000–A21P, SA52000–A22P, SA52000–A23P, SA55000–A1, SA55000–A20P, had cracked in the area of the exhaust valve of the cylinder head since the year 2000. We received reports of 10 additional failures since that time, and the total number of reported failures is currently 24. We determined that the minimum wall thickness of the SAP cylinder assemblies, P/Ns SA52000–A1, SA52000–A20P, SA52000–A21P, SA52000–A22P, SA52000–A23P, SA55000–A1, SA55000–A20P, is significantly thinner in the failure location than the original equipment manufacturer (OEM) cylinders. We certified the SAP cylinders as equivalent replacement Parts Manufacturer Approval (PMA) parts for TCM 520 and 550 series engines, however, this design discrepancy results in stresses in the cylinder wall that are much higher in the SAP cylinder assemblies than in the OEM cylinder assemblies when subjected to identical loading. These higher stresses result in a lower fatigue life for the SAP cylinder assemblies relative to that of the OEM parts. The time-to-cracking or separation for this failure mode ranges between 823 hours time-since-new (TSN) and 1,985 TSN. The thin-wall thickness condition in the area of the exhaust valve seat of the cylinder head has been present since the initial SAP design, and it is present in all SAP cylinders of that design that have been manufactured to date. This condition, if not corrected, could result in immediate loss of engine power, possible structural damage to the engine, and possible fire in the engine compartment.

FAA's Determination and Requirements of the Proposed AD

We have evaluated all pertinent information and identified an unsafe condition that is likely to exist or develop on other products of this same type design. We are proposing this AD, which would require inspecting or replacing, or both, certain SAP cylinder assemblies within 25 flight hours TIS after the effective date of the proposed AD for cylinders that are at their respective time-before-overhaul (TBO) TIS flight hours or have exceeded their respective TBO TIS flight hours.

Costs of Compliance

We estimate that this proposed AD could affect 8,000 engines installed on airplanes of U.S. registry. We also estimate that it would take about 5 work-hours per cylinder to perform the proposed actions, and that the average labor rate is $80 per work-hour. Required parts would cost about $1,150 per cylinder. Based on these figures, we estimate the total cost of the proposed AD to U.S. operators to be $12,400,000.

Authority for This Rulemaking

Title 49 of the United States Code specifies the FAA's authority to issue rules on aviation safety. Subtitle I, Section 106, describes the authority of the FAA Administrator. Subtitle VII, Aviation Programs, describes in more detail the scope of the Agency's authority.

We are issuing this rulemaking under the authority described in Subtitle VII, Part A, Subpart III, Section 44701, ''General requirements.'' Under that section, Congress charges the FAA with promoting safe flight of civil aircraft in air commerce by prescribing regulations for practices, methods, and procedures the Administrator finds necessary for safety in air commerce. This regulation is within the scope of that authority because it addresses an unsafe condition that is likely to exist or develop on products identified in this rulemaking action.

Regulatory Findings

We have determined that this proposed AD would not have federalism implications under Executive Order 13132. This proposed AD would not have a substantial direct effect on the States, on the relationship between the national Government and the States, or on the distribution of power and responsibilities among the various levels of government.

For the reasons discussed above, I certify that the proposed AD:

1. Is not a ''significant regulatory action'' under Executive Order 12866;

2. Is not a ''significant rule'' under the DOT Regulatory Policies and Procedures (44 FR 11034, February 26, 1979); and

3. Would not have a significant economic impact, positive or negative, on a substantial number of small entities under the criteria of the Regulatory Flexibility Act.

We prepared a regulatory evaluation of the estimated costs to comply with this proposed AD. You may get a copy of this summary at the address listed under **ADDRESSES**.

List of Subjects in 14 CFR Part 39

Air transportation, Aircraft, Aviation safety, Safety.

The Proposed Amendment

Under the authority delegated to me by the Administrator, the Federal Aviation Administration proposes to amend 14 CFR part 39 as follows:

PART 39—AIRWORTHINESS DIRECTIVES

1. The authority citation for part 39 continues to read as follows:

Authority: 49 U.S.C. 106(g), 40113, 44701.

§ 39.13 [Amended]

2. The FAA amends § 39.13 by adding the following new airworthiness directive:

Superior Air Parts, Inc. (SAP): Docket No. FAA–2007–0051; Directorate Identifier 2007–NE–37–AD.

Comments Due Date

(a) The Federal Aviation Administration (FAA) must receive comments on this airworthiness directive (AD) action by June 10, 2008.

Affected ADs

(b) None.

Applicability

(c) This AD applies to Teledyne Continental Motors (TCM) IO–520, TSIO–

520, and IO–550 series engines with SAP cylinder assemblies, part numbers (P/Ns) SA52000–A1, SA52000–A20P, SA52000–A21P, SA52000–A22P, SA52000–A23P, SA55000–A1, or SA55000–A20P, installed. These engines are installed on, but not limited to, the airplanes listed in Table 1 of this AD.

TABLE 1.—TELEDYNE CONTINENTAL MOTORS-RELATED AIRCRAFT MODELS

Engine model	Aircraft manufacturer	Aircraft model designation
IO–520–A	Cessna	210 D, E, F, G, & H
IO–520–A	Cessna	206
IO–520–A	Cessna	P206
IO–520–A	Rockwell	200 D
IO–520–B	Beechcraft	36 Bonanza
IO–520–B	Beechcraft	A36
IO–520–B	Navion	Range Master
IO–520–BA	Beechcraft	A36
IO–520–BA	Beechcraft	S & V35, V35A, V35B
IO–520–BA	Beechcraft	C33 A
IO–520–BA	Beechcraft	E33 A & C
IO–520–BA	Beechcraft	F33 A & C
IO–520–BA	Navion	Range Master
IO–520–BB	Beechcraft	A36
IO–520–BB	Beechcraft	V35B
IO–520–BB	Beechcraft	F33 A
IO–520–C & CB	Beechcraft	C55—E55 Baron
IO–520–D	Bellanca	17–30 Viking
IO–520–D	Cessna	A188–300 AG Truck
IO–520–D	Cessna	185
IO–520–E	(Cessna 310)	Exec 600
IO–520–E	(Beech Baron)	Pres 600
IO–520–F	Cessna	207
IO–520–F	Cessna	U206
IO–520–K	Bellanca	17–30A
IO–520–L	Cessna	210 K, L, M, N & R
IO–520–L	Cessna	210N II
IO–520–L	Cessna	210R
IO–520–M	Cessna	310R
IO–520–MB	Cessna	310R
IO–550–A	Cessna	310 Conversion
IO–550–B	Beechcraft	A36
IO–550–B	(Beech Bonanza)	Foxstar
IO–550–C	Beechcraft	58 Baron
IO–550–D	Cessna	185/188 Conversion
IO–550–E	Cessna	310 Conversion
IO550–F	Cessna	206/207 Conversion
IO–550–L	Cessna	210 Conversion

Unsafe Condition

(d) This AD results from reports of cracks in the area of the exhaust valve and separation of cylinder heads from the barrels of SAP cylinder assemblies with certain part numbers. We are issuing this AD to prevent separation of the cylinder head, which could result in immediate loss of engine power, possible structural damage to the engine, and possible fire in the engine compartment.

Compliance

(e) You are responsible for having the actions required by this AD performed within the compliance times specified unless the actions have already been done.

Inspecting SAP Cylinder Assemblies

(f) For TCM IO–520, TSIO–520, and IO–550 series engines with SAP cylinder assemblies, P/Ns SA52000–A1, SA52000–A20P, SA52000–A21P, SA52000–A22P, SA52000–A23P, SA55000–A1, or SA55000–A20P, installed, with over 750 flight hours time-in-service (TIS), do the following within 25 flight hours TIS after the effective date of this AD:

(1) Inspect each cylinder head around the exhaust valve side for visual cracks or any signs of black combustion leakage.

(2) Replace any cracked or leaking cylinders.

(3) Perform a standard cylinder compression test using paragraph 8–14., Compression Testing of Aircraft Engine Cylinders, in Advisory Circular 43.13–1B, Change 1, dated September 27, 2001. Also, SAP Service Bulletin B08–01, dated January 10, 2008, contains information on cylinder differential pressure tests.

(i) If the cylinder pressure gage reads below 60 pounds per-square inch, apply a 2 percent soapy solution to the side of the leaking cylinder.

(ii) If you see air leakage and bubbles on the side of the cylinder, near the head-to-cylinder interface, replace the cylinder assembly.

(g) Thereafter, repeat the cylinder visual inspections and compression tests within 50 flight hours time-since-last inspection (TSLI) until the cylinders reach their time-before-overhaul (TBO) limits.

Replacing SAP Cylinder Assemblies

(h) For TCM IO–520, TSIO–520, and IO–550 series engines with SAP cylinder assemblies, P/Ns SA52000–A1, SA52000–A20P, SA52000–A21P, SA52000–A22P, SA52000–A23P, SA55000–A1, or SA55000–A20P, installed, that have accumulated or exceeded their respective TBO hours, replace the cylinder assembly within 25 flight hours TIS after the effective date of this AD.

Prohibition Against Installing Certain P/N SAP Cylinder Assemblies

(i) After the effective date of this AD, do not install any SAP cylinder assembly, P/Ns SA52000–A1, SA52000–A20P, SA52000–A21P, SA52000–A22P, SA52000–A23P, SA55000–A1, or SA55000–A20P, in any engine.

Alternative Methods of Compliance

(j) The Manager, Special Certification Office, has the authority to approve alternative methods of compliance for this AD if requested using the procedures found in 14 CFR 39.19.

Related Information

(k) FAA Advisory Circular 43.13–1B, Change 1, dated September 27, 2001, and SAP service bulletin B08–01, dated January 10, 2008, contain information on cylinder differential pressure tests.

(l) Contact Tausif Butt, Aerospace Engineer, Special Certification Office, FAA, Rotorcraft Directorate, 2601 Meacham Blvd., Fort Worth, TX 76137–4298; e-mail: *tausif.butt@faa.gov*; telephone (817) 222–5195; fax (817) 222–5785, for more information about this AD.

Issued in Burlington, Massachusetts, on April 4, 2008.

Peter A. White,

Assistant Manager, Engine and Propeller Directorate, Aircraft Certification Service.

[FR Doc. E8–7711 Filed 4–10–08; 8:45 am]

BILLING CODE 4910–13–P

DEPARTMENT OF TRANSPORTATION

Federal Aviation Administration

14 CFR Part 39

[Docket No. FAA–2008–0423; Directorate Identifier 2008–CE–010–AD]

RIN 2120–AA64

Airworthiness Directives; GENERAL AVIA Costruzioni Aeronatiche Models F22B, F22C, and F22R Airplanes

AGENCY: Federal Aviation Administration (FAA), Department of Transportation (DOT).

ACTION: Notice of proposed rulemaking (NPRM).

SUMMARY: We propose to adopt a new airworthiness directive (AD) for the products listed above. This proposed AD results from mandatory continuing airworthiness information (MCAI) originated by an aviation authority of another country to identify and correct an unsafe condition on an aviation product. The MCAI describes the unsafe condition as:

ENAC Italy AD 2004–376 was issued in response to two separate reports of cracks found in the Firewall-to-Engine mounting attachments. Detachment of the engine mounts from the structure is the possible consequence. Although the actual cause has not been finally determined, some repairs have been approved to address and correct the unsafe condition.

This new AD, which supersedes ENAC Italy AD 2004–376, retains the initial inspection requirement, adds repetitive inspections and clarifies the conditions under which aircraft that have been repaired by an approved method can be allowed to return to service.

The proposed AD would require actions that are intended to address the unsafe condition described in the MCAI.

DATES: We must receive comments on this proposed AD by May 12, 2008.

ADDRESSES: You may send comments by any of the following methods:

- *Federal eRulemaking Portal:* Go to *http://www.regulations.gov.* Follow the instructions for submitting comments.
- *Fax:* (202) 493–2251.
- *Mail:* U.S. Department of Transportation, Docket Operations, M–30, West Building Ground Floor, Room W12–140, 1200 New Jersey Avenue, SE., Washington, DC 20590.
- *Hand Delivery:* U.S. Department of Transportation, Docket Operations, M–30, West Building Ground Floor, Room W12–140, 1200 New Jersey Avenue, SE., Washington, DC 20590, between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays.

Examining the AD Docket

You may examine the AD docket on the Internet at *http://www.regulations.gov;* or in person at the Docket Management Facility between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays. The AD docket contains this proposed AD, the regulatory evaluation, any comments received, and other information. The street address for the Docket Office (telephone (800) 647–5527) is in the **ADDRESSES** section. Comments will be available in the AD docket shortly after receipt.

FOR FURTHER INFORMATION CONTACT: Sarjapur Nagarajan, Aerospace Engineer, FAA, Small Airplane Directorate, 901 Locust, Room 301, Kansas City, Missouri 64106; telephone: (816) 329–4145; fax: (816) 329–4090.

SUPPLEMENTARY INFORMATION:

Comments Invited

We invite you to send any written relevant data, views, or arguments about this proposed AD. Send your comments to an address listed under the **ADDRESSES** section. Include ''Docket No. FAA–2008–0423; Directorate Identifier 2008–CE–010–AD'' at the beginning of your comments. We specifically invite comments on the overall regulatory, economic, environmental, and energy aspects of this proposed AD. We will consider all comments received by the closing date and may amend this proposed AD because of those comments.

We will post all comments we receive, without change, to *http://www.regulations.gov,* including any personal information you provide. We will also post a report summarizing each substantive verbal contact we receive about this proposed AD.

Discussion

The European Aviation Safety Agency (EASA), which is the Technical Agent for the Member States of the European Community, has issued AD No. 2008–0015, dated January 18, 2008 (referred to after this as ''the MCAI''), to correct an unsafe condition for the specified products. The MCAI states:

ENAC Italy AD 2004–376 was issued in response to two separate reports of cracks found in the Firewall-to-Engine mounting attachments. Detachment of the engine mounts from the structure is the possible consequence. Although the actual cause has not been finally determined, some repairs have been approved to address and correct the unsafe condition.

This new AD, which supersedes ENAC Italy AD 2004–376, retains the initial inspection requirement, adds repetitive inspections and clarifies the conditions under which aircraft that have been repaired by an approved method can be allowed to return to service.

The MCAI requires you to repetitively inspect the structure surrounding the heads of the four bolts of the engine mount attachment bracket for cracks or damage and repair any cracks or damage found as a result of the inspection. You may obtain further information by examining the MCAI in the AD docket.

Relevant Service Information

Gomolzig Flugzeug-und Maschinenbau GmbH has issued General Avia F22 Modification 15328 Repair Instructions, dated September 10, 2007. The actions described in this service information are intended to correct the unsafe condition identified in the MCAI.

FAA's Determination and Requirements of the Proposed AD

This product has been approved by the aviation authority of another country, and is approved for operation in the United States. Pursuant to our bilateral agreement with this State of Design Authority, they have notified us of the unsafe condition described in the MCAI and service information referenced above. We are proposing this AD because we evaluated all information and determined the unsafe condition exists and is likely to exist or develop on other products of the same type design.

There are no products of this type currently registered in the United States. However, this rule is necessary to ensure that the described unsafe condition is addressed if any of these products are placed on the U.S. Register in the future.