



27 September 2006

The Listing Manager
Australian Stock Exchange Limited
Level 8, 2 The Esplanade
PERTH WA 6000

Dear Sir

INVESTOR NEWSLETTER SEPTEMBER 2006

Please find attached our latest Investor Newsletter that will be sent to shareholders shortly.

A clearer screen resolution version can be found at the Company's website at www.smsystems.com.au.

Yours faithfully

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Structural Monitoring Systems

Investor Newsletter
September 2006

**STRUCTURAL
MONITORING
SYSTEMS**

In this edition:

MD's Report

Boeing Program

Ministerial Visit

CVM™ Applications

PM200

CVM™ Market



Boeing Program

The FAA's Airworthiness Assurance NDI Validation Center (AANC) at Sandia Labs, in conjunction with Boeing, the University of Arizona, Structural Monitoring Systems and interested airlines, have conducted a program to develop and validate CVM™ sensors that can be permanently installed to monitor critical regions of an aircraft's structure.

Some current Boeing aircraft maintenance operations require personnel to enter into normally inaccessible or hazardous areas to perform mandated, nondestructive inspections. To gain access for these inspections, structure must be removed, sealant must be removed and restored, and the reassembly processes must be completed.

These processes are not only time consuming but they provide the opportunity to induce further damage to the structure and reduce aircraft availability. The use of in-situ sensors, coupled with remote interrogation, can be employed to

overcome inspection problems stemming from accessibility limitations, complex geometries and the location and depth of hidden damage.

The goal of this project has been to enable Boeing Commercial Aircraft to include CVM™ sensor technology into their Nondestructive Testing Standard Practices Manual (SPM). The test specimens include those designed to simulate the Boeing aircraft lap joint and others with single crack origination sites.

The test has studied the affects of surface coating, skin thickness, and material type on the performance of the CVM™ sensors. Statistical methods were employed to derive Probability of Detection (POD) levels for each of the test scenarios. The result is a series of flaw detection curves that can be used to propose CVM™ sensors for aircraft crack detection. In conjunction with this work complimentary in-flight testing of CVM™ with a number of US airlines has been undertaken now for a number

of years to study the deployment and long-term operation of CVM™ sensors on aircraft in a range of locations and different environments.

The culmination of this testing will be a joint Boeing, FAA, AANC, University of Arizona, and SMS paper, which will be presented to the Air Transport Association NDT conference on 19th October detailing the crack detection capabilities of the CVM™ sensors and their performance in actual flight environments, and the prospects for structural health monitoring applications on commercial aircraft.

In parallel with these final stages of the SPM program SMS has been working with Boeing and US airlines to identify suitable applications on MD-80 and 737 aircraft on which CVM™ can be used as an Alternative Means of Compliance (AMOC) for existing mandated Service Bulletin (SB) inspections. As a result two US airlines have requested that CVM™ be considered for the initial set of AMOC applications.



MD's Report

Mark Vellacott MSc, MBA, FRACs, CEng
Managing Director

Welcome to our third quarterly newsletter for 2006.

There has been considerable progress made on product development with two important product launches over the coming months.

The new PM200 periodic monitoring system, will be launched following the US Air Transport Association NDT conference at Fort Worth in mid-October. Boeing, FAA, Airworthiness Assurance Center at Sandia National Laboratories, University of Arizona and SMS will deliver a joint presentation on the Company's CVM™ technology summarising the results obtained to qualify CVM™ for inclusion in the Boeing Standard Practice Manual.

The PM200 has been designed to meet the exacting requirements of the aerospace industry. An initial production batch of PM200 has commenced.

Another new CVM™ based product will be launched at an automotive industry conference in Detroit at the end of October. The new product is a device to simplify quality control testing in manufacturing industries.

PBR, the large Melbourne based automotive brake manufacturer will use this new CVM™ product for batch testing brake calipers for quality control. Quality control testing in manufacturing is a large business and the Company is now looking to expand in this market. Prior to the launch discussions are already advanced with General Motors in Brazil to adopt the CVM™ testing system.

In addition US aircraft manufacturer Lockheed Martin has invited SMS to present a paper at its Hercules C-130 operator conference during the first week in November. The invitation follows the development of CVM™ inspections for the South African Hercules operator SAFAIR. The Company is now marketing CVM™ to other operators of the popular Hercules aircraft to address fleet wide inspection requirements.

Shareholders will be aware that the CVM™ system has been flying successfully with a number of US Airlines for the last two years as part of the Boeing / FAA validation program. Following this successful flight testing program and the probability of detection results that have been generated by the US Government's Sandia National Laboratories, a new CVM™ procedure has been drafted for inclusion in the Boeing NDT Standard Practices Manual.

Boeing and SMS are now progressing with the development of CVM™ based alternative means of compliance for a number of existing aircraft inspections that have been identified by two US airlines.

The Joint Development Agreement program with Airbus continues to produce impressive results, is on track and is now well advanced. Under the next phase of the JDA Airbus will install CVM™ sensor systems on an Airbus aircraft being operated within their own flight test fleet and also on the aircraft of a major European airline.

Outside of the JDA activities Airbus is evaluating CVM™ for use on components manufactured in composite materials: this is an exciting development on a new application for CVM™ that the Company has been developing over the last two years. The Company has successfully demonstrated that CVM™ can monitor structural damage in composite materials, such as carbon fibre, where current inspection techniques are difficult and costly. CVM™ can be incorporated into the composite materials at the manufacturing stage. Large sections of modern aircraft are now constructed in composite fibre. Airbus has engaged the Cooperative Research Centre for Advanced Composite Structures in Melbourne to undertake further work on this application of the CVM™ technology.

At the request of Embraer of Brazil the world's fourth largest commercial aircraft manufacturer the Company has made a proposal for the installation of a CVM™ system to monitor a major full scale fatigue test program. Embraer is looking to qualify an in-flight structural monitoring system based on the CVM™ system for their aircraft. Embraer manufacture regional and business aircraft in the 50 to 120 seat range.

SMS has also been requested to provide a CVM™ solution for a large European helicopter manufacturer. A program of work has commenced to qualify CVM™ sensor applications for a fleet installation commencing in 2007.

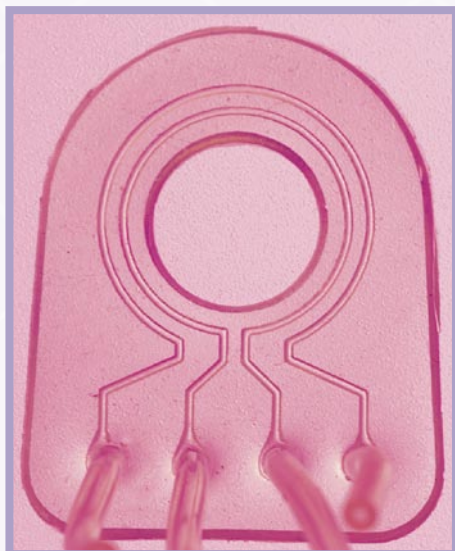
The level of enquiry for CVM™ monitoring solutions is continuing to increase placing challenging demands on the Company's staff to deliver CVM™ solutions for the expanding customer base.

The Company continues the aggressive protection of its Intellectual Property with the lodgment of a series of new patent applications for different variants of CVM™ and production processes.

In conclusion, commercial interest in CVM™ is on the increase. The Company is positioning itself to have a range of qualified CVM™ products in production for major marketing activities from the fourth quarter of 2006. It is also important that many of these new initiatives are in industries other than aviation and do not have the same demanding certification processes.



CVM™ Applications



In addition to the applications that are being developed for Boeing aircraft, SMS has recently commenced working on the development and testing of new applications for aircraft in Europe, automotive testing in Brazil, mining equipment in Australia, helicopters in Europe and Canada, and aircraft structural test programs in Brazil and recently in China.

Increasingly, SMS is being approached to develop crack detection applications because of the high profile and reputation that CVM™ is gaining in the aerospace industry around the world.

The process of developing a new CVM™ application requires one of the SMS application engineers to review geometry, material and surface treatment types, loading condition during inspection and location and direction of the cracking problem.

Understanding the ambient temperature, pressure and contamination of the environment in which the sensor will be operating is also important as this may effect

the selection of the type of material that will be used to manufacture the sensor and any protective coatings that may be applied over the sensor during the installation process.

The design of the sensors' galleries and sensor placement are two of the most critical aspects of the application process. The galleries are designed to intercept a crack either at right angles or tangentially from the direction of crack propagation. This requires that the SMS engineer works closely with structural engineers who understand the nature and fracture mechanics of the structure for which a CVM™ solution is being developed.

Fortunately the simplicity of the CVM™ principal enables structural engineers to understand the best geometry of the galleries and enables a set of sensor templates to be quickly produced. The sensor templates are simply either paper or laser cut plastic sheets that can be placed onto the structure to confirm with the customer that this design will meet their crack detection requirements.

In some cases it is possible to use standard off the shelf sensor designs, of which SMS has a wide range of standard sensor lengths and diameters. In other cases SMS has to design customised sensors to suit the application.

Ministerial Visit

Australian Industry Minister Ian Macfarlane visited SMS at the end of August to get a first-hand update on the progress that SMS is making developing and commercialising CVM™ technology with the assistance of a \$2.98 million grant through the Australian Government's Commercial Ready program.

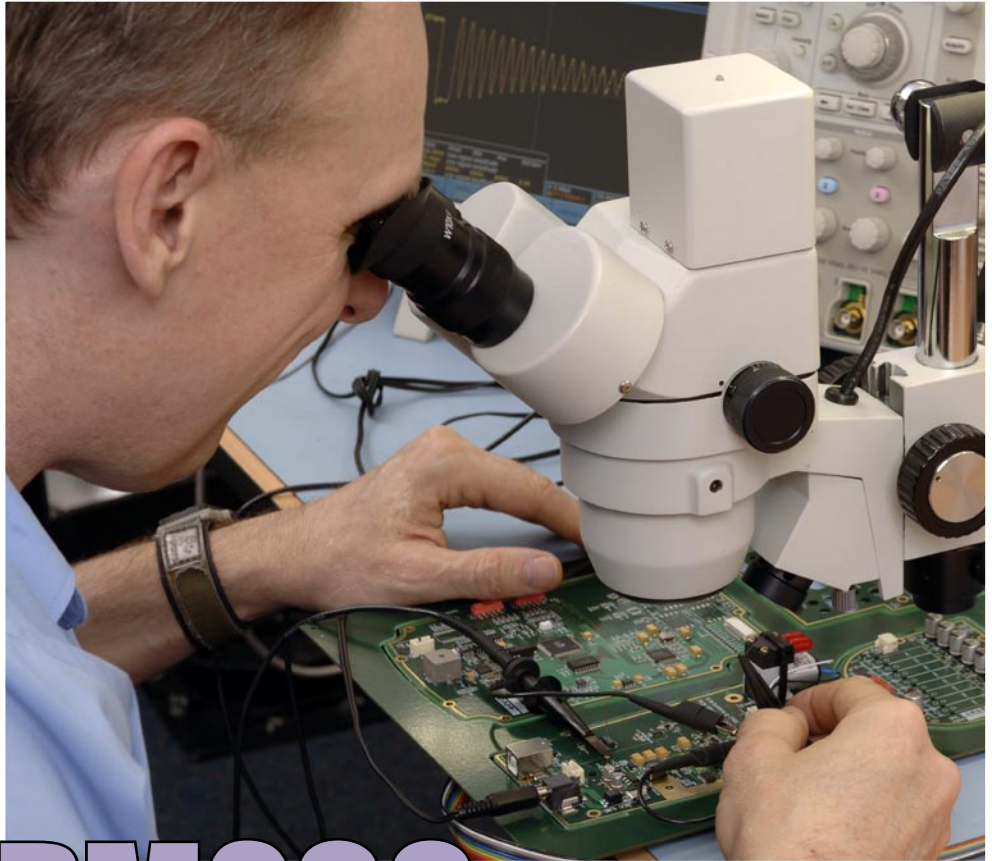
During the visit Mr Macfarlane was given a demonstration of the new production version PM200, inspected the applications that are being developed for Boeing 737 and Hercules aircraft and toured the sensor development and production areas.

In a media release associated with his visit, Minister Macfarlane said,

“Aircraft operators around the world are constantly looking for ways to improve safety and reduce costs.”

“Here, in Perth, there's a project with the potential to deliver a lot more information about the structural integrity of an aircraft, helping decisions about aircraft maintenance, repairs and replacement.”

“Billions of dollars are spent on aircraft maintenance, repair and replacement each year so any system which can offer to save just a fraction of these costs has huge export and earning potential.”



PM200

Over the last 12 months SMS's instrumentation group has worked hard to design and develop the company's latest periodic monitoring system - the PM200.

The completion of the PM200 has been timed to coincide with the finalisation of the Boeing and RAAF DGTA qualification activities. The PM200 provides SMS with an instrumentation system capable of being produced in volume, and that is able to support growth in sales in the civil and military aircraft CVM™ sensor retrofit market.

The PM200's development is an important commercialisation milestone for SMS, and a batch of twenty five PM200s has been built for product launch and to fill initial customer orders.

The Australian Government's Federal AusIndustry Commercial Ready grant has provided 50% of the funds used in the development program, and it was highly appropriate that the first live demonstration of the production version of the PM200 was given during Industry Minister, Ian Macfarlane's visit to SMS.

The PM200 replaces the PM4 inspection system and was developed in response to customer requests for a lighter and more ergonomic system. The PM200 has also been designed with high volume production rates in mind, and incorporates a light weight carbon fibre vacuum tank, and the latest electronics, measurement transducer and pneumatic valve technologies.

The use of these technologies and a new patented CVM™ measurement technique in the PM200 has in comparison with the PM4 enabled weight to be reduced from 6kg to 1.1kg and the overall volume to be reduced by 90%, or from the size of a small suitcase to a hand held device.

Relative to the previous PM4, SMS has improved the PM200's measurement sensitivity by a factor of four as well as improving the detection threshold to enable earlier detection of cracks.

Initial customer response to the new PM200 has been very positive and it will be playing a major role in our market initiatives for the remainder of this year and in the development of revenue streams during 2007. The first commercial order for a PM200 has already been placed by Airbus.

The next challenge for the instrumentation group will be to use the experience gained in producing the PM200 in the development of an airborne monitoring system that will be capable of being permanently installed on an aircraft and continuously monitoring CVM™ sensors. This is also the final objective of the JDA agreement in place with Airbus and the new program coming together with Embraer.



CVM™ Market

The market for CVM™ sensors and instrumentation derives from the value the technology can generate. This value stems from the ability to enable increased asset productivity to operators of built structures, operating plants or vehicles together with maintenance labour savings.

Increased productivity comes from the increased time available for revenue earning operation through reduced 'down time' since most machines and vehicles are checked and serviced regularly to maintain safety and/or efficiency. Inspections for cracks are commonly a part of this process as crack initiation is a tangible sign that the structure has begun to deteriorate. The application of a CVM™ system to known potential cracking areas can achieve significant reductions in 'down time' by carrying out checks quickly and accurately without the need to disassemble and reassemble the structure.

This holds true for any equipment, whether a mining vehicle, a transport vehicle, an aircraft or even a simple structural fatigue test facility, although higher value assets such as aircraft tend to be the most sensitive to any 'down time'.



CVM™ Retrofitted to Existing Civil Aircraft

The CVM™ Periodic Monitoring system has undergone testing with Boeing and the FAA in association with a number of US Airlines for inclusion into the Boeing NDT Standard Practices Manual in the near future.

The initial three CVM™ inspection applications have already been identified in association with a US airline as being suitable for CVM™ are on the popular Boeing 737-300/400/500 series of aircraft. This has an average age of 15 years and has an increasing number of mandated inspections. Several airlines have fleets in excess of 100 aircraft.

The current service bulletins for these three inspections indicate that CVM™ technology has the potential to save on average 120 hours of maintenance and inspection time per aircraft per year, representing a cost in the region of US\$10,000 per aircraft.

The other major benefit to the airline of using CVM™ to perform inspections is its potential to improve the availability or usage of aircraft. This can be significant as each additional half day per year of availability for an aircraft has the potential to add US\$30,000 to an airline's earnings.

In pricing CVM™ applications, SMS is targeting up to a quarter of the value of the benefit that airlines realistically achieve from their use.

With a world 737 fleet size in the region of 1900 aircraft in the target market 10 - 15 year age range, even reducing the addressable market for these aircraft by 50% indicates that this represents a substantial market opportunity for CVM™.

It is expected that other aircraft types in the 10 - 15 year age range, such as the 747, 757, 767, A300 and A310, will yield similar market opportunities once inspections suitable for CVM™ have been identified and approved. The addressable market for retrofit to civil transport aircraft over the next ten years is potentially up to 50% of 4500 aircraft.



CVM™ fitted in New Civil Aircraft during Production

Airbus, and more recently Embraer, have identified the potential to produce a more efficient aircraft through the incorporation of continuous in-flight structural health monitoring installed during production.

Airbus and other aircraft manufacturers are investing in the development of Structural Health Monitoring (SHM), of which CVM™ is a leading enabling technology, to derive major benefits and value in two areas:

1. Shorter planned maintenance schedules leading to higher utilisation
2. Reduced structural weight through reduced redundancy and over design

For example, a new 150 seat aircraft would potentially save two days per year 'down-time' and more than 200kg of structural weight due to the incorporation of CVM™. The improved productivity is estimated to amount to more than \$US300,000 'annually'. This kind of marketing advantage is extremely valuable for aircraft manufacturers competing on a value basis. Over 20 years, a US\$6 million value (approximately 15% of list price for a 150 seat aircraft) is a great way of protecting pricing in a very competitive market.

The SMS opportunity on completion of the development phase of this application, will be realised through the sale and or licensing of the system and can be expected to be a percentage of the value generated. Airbus alone will be producing at least an aircraft per day into the future.



The Military Aircraft CVM™ Retrofit Market

A number of Military helicopter and fixed wing aircraft operators have seen the potential value of CVM™ in optimising 'availability' for duty, hence the on-aircraft trials with Nimrod, Sea King, CH53, P3C and Blackhawk. This has become particularly noticeable in recent times where the demands on an ageing fleet of transporters such as the C130 'Hercules' have increased significantly. Furthermore, defence aircraft support service companies are increasingly awarded multi-million dollar maintenance contracts based on 'Aircraft Availability' targets rather than 'Cost-Plus' contracts.

Ongoing work with the Australian Director General Technical Airworthiness (DGTA) is targeted at obtaining military endorsement for the use of CVM™ on RAAF military platforms in the coming months. Inter-force relationships will allow SMS to leverage the RAAF endorsement to a wider military market over time starting with two or three common platforms. Such is the variety and volume of military platforms, that the potential opportunity for SMS will be at least equal to the civil aircraft and probably higher.

SMS's current focus is on the large fleets of C130 'Hercules' aircraft of which there is a world fleet of 1100 aircraft and an increasingly burdensome inspection regime. SMS has also begun a qualification program with a helicopter manufacturer targeting specific inspections.

Other CVM™ Market Opportunities

As mentioned, the CVM™ system for structural monitoring can be of value on many machines and vehicles. SMS has identified aircraft as having a very high potential to create value and therefore generate an income. However, there are a number of other industries where the ability to save down time could be very valuable.

Mining

In mining operations for example, the structural failure of a hydraulic shovel or even the down-time associated with inspections to ensure failure does not occur, can interrupt a process that produces tens of thousands of dollars worth of minerals in only a few hours. This potential is currently being explored with some major mining companies based in Australia and could yield value to SMS without the need for the lengthy qualification process experienced in aerospace.

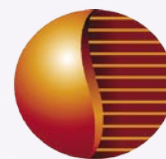
Automotive Testing

SMS in conjunction with an Australian parts manufacturer has developed a simplified, in-expensive method of making the fatigue testing of automotive components quicker and more efficient. Essentially, the fatigue tests are automatically stopped when the smallest crack is detected so that time and labor costs are saved. For many manufacturers of high quality, high volume parts, the need for quality and development testing is significant.

With the endorsement of the manufacturer, SMS anticipates potential income to grow in this high volume, low cost, high margin sector of the market.

Future Projects

There is almost no limit to the potential applications for CVM™ including the petrochemical industry and the power generation industry. The strategy at SMS is to focus and establish a strong business in aerospace in the next three to five years, before branching out to these potentially valuable areas.



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