

FEATURE

Still a long way to go

Is the air of complacency encountered in the official circles about the state of primary education justified? Where are we now? Where should we be in ten years? Asks Manzoor Ahmed as he assesses our progress in primary education.

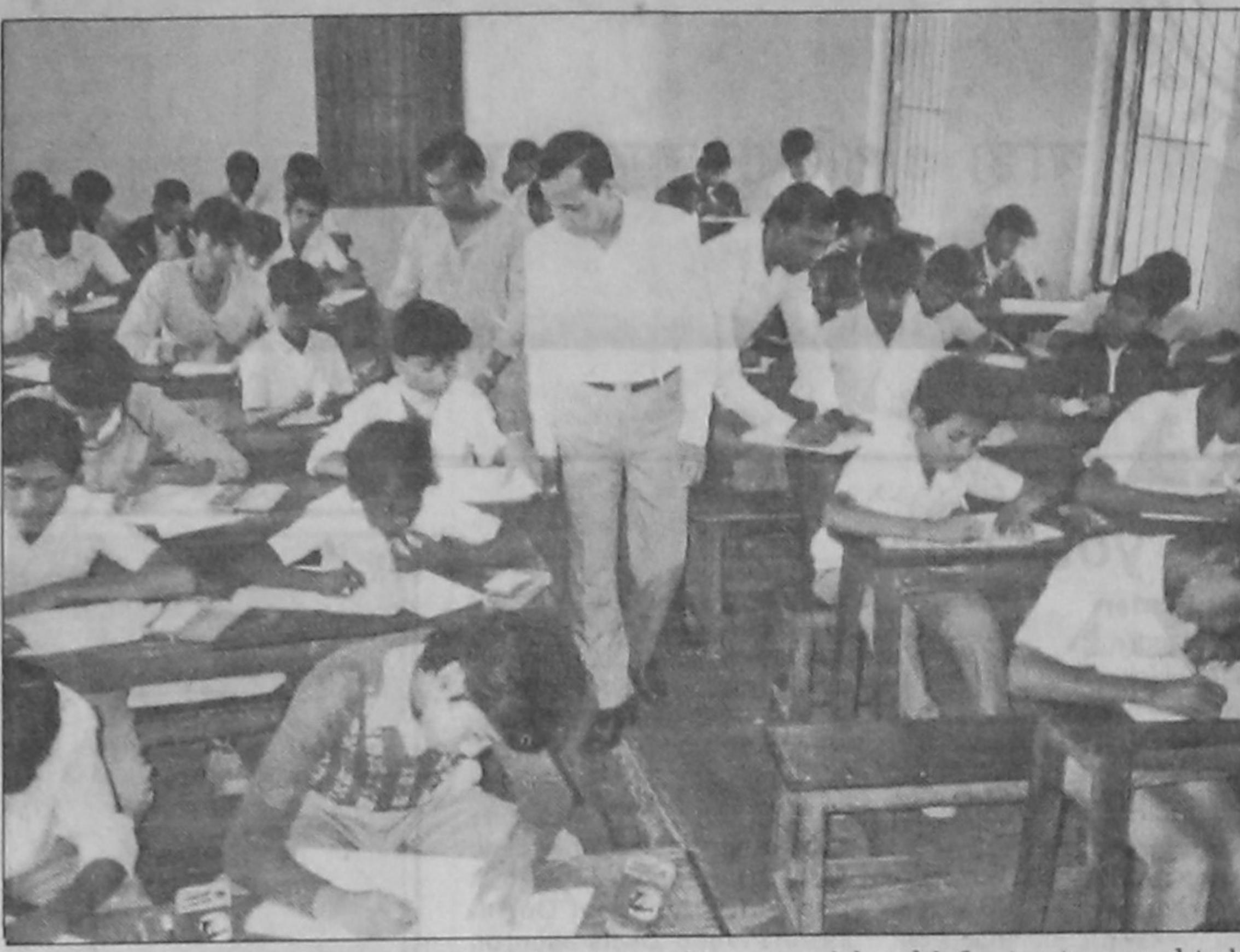
THESE have indeed been major achievements over the past decade. Gross enrolment rate in primary education is already over 100 per cent ('gross' includes all the children enrolled including over and under the official age-range of 6-10 years for classes 1 to 5. It can be over 100 per cent because the number actually enrolled is compared against the estimated number of children in the 6-10 years age group to calculate the enrolment rate). Net enrolment rate is about 80 per cent (Derived by taking count of only those of the 6-10 age group enrolled in school and comparing this number with the estimated total number of children in the same age-group. There are different estimates of the 6-10 age group, according to different government authorities and the United Nations demographic projection, because an actual head-count of the age group does not exist. The gross and net enrolment rates can be affected upward or downward depending on the estimated number in the 6-10 age group chosen for calculating the rate.). The gender gap in primary enrolment has narrowed considerably and has come close to parity. The budgets for primary education have increased over the years in absolute amounts of allocation. Various initiatives have been taken such as 'food for education' and scholarships for girls enrolled in secondary schools which encourage girls to complete primary education. There is a trend of reduction in dropout and increase of completion of the five-year cycle; there has been increased investment in physical facilities and efforts to improve training and recruitment of teachers and distribution of textbooks.

However, without downplaying these achievements, it has to be recognised that about four million eligible children out of some 20 million still don't enrol in school as one is out of five. Another six million drop out before completing the primary stage. The question of quality of instruction is not on the radar screen of the authorities. Some NGOs and NGO groups such as CAMPE (Campaign for Popular Education) are trying to assess whether the basic competencies in reading, writing and numeracy are acquired by children in primary school.

Reports about progress in terms of expansion of primary education by aggregate statistics have to be qualified by the actual condition of primary education on the ground. A random visit to rural primary schools will readily show that dilapidated and unsafe classrooms, absence of basic amenities like drinking water and toilets, grossly overcrowded classrooms, few learning materials and absent teachers are the rules rather than the exception.

There is now a greater public concern and interest about primary education, which is perhaps manifest in increased enrolment in spite of the deplorable state of many primary schools. Newspapers are increasingly highlighting the poor state of primary education. One recent example is from the Bengal daily *Prothom Alo*, 22 July 2000.

Seventy-eight villages in Akhaura Upazila have no primary schools, insufficient teachers, learning materials and classrooms jeopardise learning of pupils. ... in five Unions of the



Inside the classroom ... teacher-student ratio, teaching material and infrastructure need to be enhanced.

- Star photo

Upazila, there are 35 government primary schools and 10 non-govt registered schools... Posts of two headmasters and seven assistant headmasters (in govt schools) are vacant... There is one teacher for every 145 students, although on an average there should be four for 288. Of 113 villages in the Upazila, 78 do not have a school of their own... According to Education Office sources, of 22,887 school-age children, 21,827 are enrolled. However, 50 per cent of them were found not to be attending... Two of the Unions are under 'food for education' scheme, where attendance is somewhat higher.

It is a heartening sign that a part of the media is playing an active role in highlighting educational issues. Some are also sponsoring forums for public dialogue on the issues. Cases in point are the round-table on education by *The Daily Star*, CAMPE and Plan International and a three/full pages of report on it in the *Daily Star* (30-June 2000). A similar roundtable was sponsored by the *Prothom Alo* earlier this month.

CAMPE, the umbrella organisation of education NGOs took the extremely valuable initiative of publishing the first 'Education Watch' report in 1999 based on its own systematic studies.

A second report is now under preparation. The not so positive aspect of the ferment of public interest and dialogue is that the education authorities rarely participate in these forums, not to speak of encouraging or supporting them. The official stance seems to be: We are doing all right. Moreover, we, the authorities, know best.

A truly inclusive system of primary education must be in operation in which all children including the poorest and the physically and mentally handicapped (up to 10 per cent of the population) must participate, complete the primary stage and acquire acceptable competencies in literacy, numeracy and basic knowledge. A pragmatic plan of transition to the universal eight-

year elementary education (already an announced government policy) should be in full implementation. This can begin, not by converting all five-year primary schools into eight-year ones (an unreasonable target for the decade), but by working seriously on continuity of curriculum and teacher training. There can be simultaneous operation of different grade combinations in institutions (such as 5+3+2+2; 8+4; 5+3+4; 8+2+2 grades) for primary and secondary education; but all aiming to fulfil the curricular objectives of elementary education.

Encouragement and support to NGOs to continue, expand and improve the quality of existing basic education programmes for older adolescents (roughly 8 to 14 years) such as BRAC's non-formal primary education and Basic Education for Hard-To-Reach Urban Working Children, sponsored by the Directorate of Non-formal Education. Even with improved and expanded primary education programmes, there will be still dropouts from primary schools and non-participants who will need a second chance for primary education.

We must use well the assets we have and apply the lessons learned from the past. The assets include the commitment and creative approaches of NGOs engaged in educational programmes. The lessons point to much more decentralised planning and management and co-operation with all stakeholders. It is necessary to:

• begin by recognising that commendable recent progress is no ground for complacency. The authorities should welcome public dialogue and discussion on education, participate in them seriously and professionally and encourage and support independent studies, research and assessment such as those of the 'Education Watch' project.

• recognise that NGOs and the non-government sector not only serve eight to 10 per cent of primary school children, but many are bringing innovation, creativ-

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ity and cost-effective approaches to primary education and, therefore, have a critical and long-term role in the national system of primary education.

• encourage and support comprehensive and co-ordinated planning and management of universal primary education at thana, union and village levels, involving all stakeholders government authorities, NGOs, community organisations, religious leaders and parents. The purpose will be to bring all children to schools of acceptable standards and to offer all a quality primary education. Something like this is anticipated in the IDEAL project aimed at improving quality and access in Primary education, but serious efforts are still to be made in this area.

• recognise that expenditure per learner in primary schools in real terms has been going down, is one of the lowest in the world, and has become seriously inadequate for ensuring quality learning. Significantly more has to be invested in improving the quality and quantity of learning materials, strengthening teacher supervision and their upgrading, and ensuring adequate physical environment for learning.

A ten-year perspective of quality primary education for all could be a key item on the platform of major political parties as the election for the national parliament approaches. The platform, to be more than rhetorical, must include a commitment to the steps noted above. And it would be prudent in the present confrontational political culture not to insist on an elaborate statement of national educational policy.

We hope that a time will come soon when the political temperature will lower sufficiently to make it possible to forge a consensus on key priorities and strategies in education. Meanwhile, pragmatic and practical action rather than war of words will serve the nation better.

Hands alone aren't enough for that kind of work.

So Robonaut's designers at NASA Dexterous Robotics Labo-

ratory have given their creation an arm, a torso, a head and video-camera eyes. When the full prototype is completed later this year, Robonaut will have a second arm and hand and a single leg to provide hands-free support.

That's all downhill work after the challenge of building the hand and arm, says project director Robert Ambrose.

"We've gone after the hardest part first," Ambrose says.

Though its grip is only about half that of a human and the arm can lift only 21 pounds, that's more than enough strength to work in the weightlessness of space.

Robonaut's controls are straight out of popular science fiction. The controller wears a pair of stereoscopic goggles which display whatever Robonaut's camera eyes see, and wears a sensor-filled glove to control the hand and arm.

Just moving the glove tells Robonaut how far to extend its arms or twist its wrist. Once the technology is refined, the glove will provide a sense of touch to the operator, Ambrose says.

Though it was built with parts already rated to withstand the rigors of space travel, Robonaut won't see orbit for at least five years, Ambrose says.

In space, Robonaut could

prepare exterior work-sites for astronauts, saving valuable

Hated at home, hailed abroad

Under fire at home, British schools prosper in Southeast Asia, writes Joshua Kurlantzick of AFP from Bangkok

UNDER fire at home, British schools are gaining popularity in Southeast Asia, where they are making changes schools in Britain should heed, teachers and parents have said.

Over the past six months, the British school system has come under fire for perpetuating elitism and failing to adapt to trends in education, such as making classrooms more child-centered.

The controversy over schools in Britain has been highlighted by the Laura Spence case, in which Spence, an outstanding student at a comprehensive (state-funded) school, failed to get a place at Oxford but was accepted at Harvard, one of America's elite universities.

After the Spence case became public, Britain's Chancellor of the Exchequer Gordon Brown said the United Kingdom's education system was "an absolute scandal," unable to change its traditional ways.

In Southeast Asia, however, schools following a British curriculum have flourished by mixing traditional academic rigor with a willingness to incorporate local traditions.

The number of British schools, and the enrolment at these schools, has grown exponentially in the past decade, as the schools have innovatively adapted to their environments," said a Singapore-based educational consultant.

At Dulwich International School, located on the southern Thailand island of Phuket built to represent the original school in London, and with an Olympic-sized swimming pool and huge

area for sports enrolment has mushroomed from 76 pupils in 1996 to 460 in 2000.

At Harrow International School Bangkok, a branch of its famous British namesake founded in 1572, there is a waiting list for places, headmaster Stuart Morris told AFP.

Harrow International's enrollment figures have risen faster than expected, despite the fact that the school does not yet have a permanent campus in Thailand, said a Hong Kong-based consultant.

And several renowned UK

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schools plan to set up franchises in Malaysia within the next five years.

Parents and teachers attribute the success of British education in Southeast Asia to a more relaxed approach than the elitist and staid UK system, they said.

Here in Bangkok, we offer more than the UK schools. We take girls, we take day students, in order to cater to the Thai mindset of wanting their children to remain close to the family," said Harrow deputy headmaster David Foster.

In Britain, Harrow is a male-

only institution and all of its pupils are boarders.

"We try to be innovative in teaching our students about the local communities around the schools, so they are not out of touch with daily life outside the ivory tower," Foster said.

Some of the British schools in Southeast Asia seem to do a better job than their parents in Britain at modernizing in step with the times," said one Bangkok-based educational consultant.

To integrate its students who wear old-fashioned boater hats as

with Southeast Asia," said Paul Beresford-Hill, headmaster of Bangkok Patana School.

"And smart parents realise that their kids need to learn English and to break out of traditional (Southeast Asian) rote learning ... if they are to go to ... succeed in leadership roles in their countries."

At Harrow Bangkok, a fine is imposed on those speaking Thai rather than English.

According to Malaysian government statistics, the former British colony sent some 14,000 students to UK universities during the 1999 academic year.

Some observers suggest that schools in the UK could learn from their overseas cousins.

"To think that my daughter could never go to Harrow in Britain, and if my son went there would be stuck in a system still so focused on moulding kids into a group ideology, making them like all other Harrow students," said one Harrow Bangkok parent.

But some educational consultants accuse British schools in Southeast Asia of overcharging for the quality of instruction they provide.

"Compare the number of teachers at these Asia British-curriculum schools who have graduate degrees and ten plus years of experience with the numbers at schools in the UK, and the schools in Asia come out badly," said one consultant.

"Yet the schools in Asia charge eight to ten thousand dollars per year, an exorbitant price."

The parent schools in Britain help with the initial funding for the franchise schools.

From robot to Robonaut

NASA's latest-generation robot has a hand that no other machine of its kind has ever had. Where other robots could simply pick objects up with grippers, Robonaut has four fingers, a thumb and a handshake to make a politician envious, writes C Bryson Hull of Associated Press

SCIENTISTS behind NASA's newest robot have outfitted their creation with an ancient tool that's still a giant leap forward: hands.

And who can blame them? Look what hands did for human evolution.

Robonaut's hands are nimble enough to pick up a small metal washer with tweezers or squeeze the trigger on a variable-speed drill. One noted roboticist calls Robonaut's hand "a masterwork of art."

"It is a big leap for robotkind," says Red Whittaker, the founder of the Field Robotics Centre at Carnegie Mellon University's Robotics Institute. Designed as a remote-controlled space helper, Robonaut was built to work with the same tools a space-walking astronaut would use.

"The idea was essentially to create a surrogate for the astronaut," says NASA engineer Chris Lovchik, who designed Robonaut's hands. "We're putting the astronaut's training into the robot, and putting the robot out to perform the drudgery in the hazardous conditions of space."

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ratory have given their creation an arm, a torso, a head and video-camera eyes. When the full prototype is completed later this year, Robonaut will have a second arm and hand and a single leg to provide hands-free support.

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Robonaut's controls are straight out of popular science fiction. The controller wears a pair of stereoscopic goggles which display whatever Robonaut's camera eyes see, and wears a sensor-filled glove to control the hand and arm.

The three-year, 3 million US dollar-project was funded only to see if the lab could produce a robot that can work with astronauts tools with a sense of touch to the operator, Ambrose says.

Though it was built with parts already rated to withstand the rigors of space travel, Robonaut won't see orbit for at least five years, Ambrose says.

In space, Robonaut could

prepare exterior work-sites for astronauts, saving valuable

space-walk time for more important tasks. But if early success is any indicator, Robonaut's future applications are fairly limitless, Ambrose says.

Wouldn't it be great if every

spacecraft had a robot that could go out and perform repair work while it's in flight?" Ambrose asks.

Ambrose envisions such an application for future planetary exploration missions. The same Robonaut could be mounted on a land rover to explore an unknown planet's surface in a configuration Ambrose likens to the Centaur, the half-man, half-horse of Greek mythology.

On Earth, Robonaut could be used in the hazardous conditions found in nuclear plants or petroleum refineries, and NASA says prosthetic makers have expressed interest in the hand.

But Ambrose's goal is less specific. He simply wants Robonaut to perform human tasks with high fidelity. Then, the technology's reach would be limited only by its human operators and their imaginations.

"At the point when you stop thinking about it as a Robonaut and think of it as an extension of a person, we've succeeded," Ambrose says.

Tomorrow 7:30 World Living : Holiday 8:30 HARDtalk (Presenter-Tim Sebastian) 9:00 BBC World News 9:30 Asia Today 10:00 World News 10:15 World Business Report 10:30 The Real India Travel Show 11:00 BBC World News 11:35 World Business Report 11:45 World Sport 12:30 HARDtalk (Presenter-Tim Sebastian) 2:00 BBC News 1:30 World Living: Talking Movies (Presenter-Tom Brook) 3:00 BBC World News 2:30 Anz Sportsline 11:35 Asian Festival Of Speed Asian Touring Car Championships Subic Bay PHILIPPINES Rounds One & Two 12:30 National Rugby League Balmain, New South Wales, AUSTRALIA- Melbourne Storm Vs Wests Tigers Round 26

12:30 Sports India 1:00 Yachting Swedish Match Grand Prix Sailing TourMarstrand, SWEDEN Swedish Match Cup 1:30 UK Domestic Cricket Norwich Union Ncl-Hampshire Vs Essex Div 2 7:30 Anz Sportsline 7:35 That Kick Boxing World Report 11:45 World Sport 12:30 HARDtalk (Presenter-Tim Sebastian) 2:00 BBC News 9:30 Gillette World Sport Special 10:30 International Motorsport News 2000 11:30 Anz Sportsline 11:35 Asian Festival Of Speed Asian Touring Car Championships Subic Bay PHILIPPINES Rounds One & Two 12:30 National Rugby League Balmain, New South Wales, AUSTRALIA- Melbourne Storm Vs Wests Tigers Round 26

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