

# DataWind announces Aakash2 project completion

**New Delhi, 2 May 2013:** DataWind today announced the completion of 100,000 Aakash low-cost computing access devices for IIT-Bombay (under the Indian Government's Ministry of Human Resources Development's National Mission for Education through Information Communication Technology). The project won by DataWind in an open and transparent international tender for the supply of Aakash1 devices at \$49.98, was subsequently modified to 98,000 Aakash2 devices and 2,000 devices with DataWind's recommendations for Aakash3, all at a price of Rs.2,263 (currently \$41.61).

The Aakash2 devices are the world's lowest cost computing access devices, delivered to IIT-Bombay with 12 months warranty and accessories at only Rs.2,263 (competitively featured tablets are available in Indian market for around Rs.5,000). The devices utilize multi-touch projective capacitive touch screens manufactured at India's only touch-screen manufacturing facility, established by the company in Amritsar. The devices are powered by a Cortex A8 – 1Ghz processor, of the same calibre as the original iPad, and contain 512MB of RAM (twice that of the original iPad). Flash memory of 4GB can be supplemented by upto 32GB through its micro-SD card slot. In addition to embedded WiFi, the Aakash2 tablet computers support external 3G and EVDO dongles for mobile broadband data connectivity. Supporting Google's Android 4.0 operating system, VGA camera, G-sensor, internal microphone, speakers and headphone jack, the Aakash2 is a full-featured tablet computer intended to break the affordability barrier with the mission of bridging the digital divide. Commercially the device is sold as the UbiSlate 7Ci.

DataWind's recommended specifications for Aakash3 contain an embedded quad-band Edge modem allowing for both cellular voice and data functionality. While external dongles provide limited coverage and can cost as much as 50% of the cost of Aakash devices, an internal cellular modem at no additional cost which allows the device to be used both as a mobile smart phone and also for ubiquitous internet connectivity with a basic SIM, will help herald India's internet revolution. The devices also provide an accelerated web experience, using DataWind's breakthrough web delivery platform covered by 18 U.S. and international patents.DataWind has delivered 2,000 units to IIT-Bombay with these specifications, as part of the 100,000 unit project. Commercially this device is sold as the UbiSlate 7C+.

### Reviews, Awards & Accolades:

 The Aakash2 has received very strong reviews globally, which resulted in DataWind's founders Raja Singh Tuli and Suneet Singh Tuli being selected by Forbes Magazine in its annual Impact 15 list of social entrepreneurs for revolutionizing education.



- The Forbes magazine review of the product referred to it as 'World Changing Indeed'. Techone 3's review called it "one of the best tablet in the market with budget-friendly price tab". Venture Beat's reviewer's conclusion was "I want this!". Even, the Indian government's Union Ministers and teachers gave the product a 'Thumb's Up".
- Quartz included it in its "Five most disruptive technologies of 2012", and Read-Write said: "People were stunned....You hold one in your hand it's easy to imagine the next billion people coming online"
- DataWind was given the ShikshaRatna Award by Digital Learning State Education Summit 2013 for the Aakash2.
- Even the UK Government's Trade & Investment branch awarded DataWind as UK's Most Innovative Mobile company for 2012.

## Content & Applications Ecosystem:

- The Aakash2 devices are supported by a very strong ecosystem of content and applications.
  Intended as a remote learning tool, with an embedded HD video co-processor, the devices deliver thousands of hours of video based lectures from the government funded NPTEL channel and other content on sites like Youtube and the Khan academy.
- DataWind provides access to a significant range of Ebook content, including the full CBSE curriculum.
- IIT-Bombay's open source lab has developed a variety of applications for engineering students to utilize the Aakash2. These include 3-D modeling applications, C++ programming tools, distance learning and live assessment tools.
- DataWind has partnered with a number of educational content providers for educational games, testing applications and remote tutoring.
- To help further enhance the ecosystem of content-development, in collaboration with the United Nations Office of Partnerships (UNOP), DataWind has put out a global call for socially responsible apps to help empower women. Run via contest on the website <u>www.appstoempower.org</u>, this global call brings together like-minded visionaries to encourage content and applications for the social good.

### Market Impact:

- Even at this early stage, the impact of the Aakash project and breaking of the affordability barrier by DataWind has been significant. The Better Business Bureau exclaimed: "Tablet Sends Shock Waves through the Industry."
- The low cost of DataWind's products has created pressure on suppliers globally and helped push pricing down. In the Indian market good quality tablets are now available under Rs.5,000 compared to over Rs.15,000 a year back. This has further helped grow the market for tablet computers in India from only 250,000 in 2011 to over 3 million in 2012. DataWind has



consistently been in the top 3 suppliers of tablet computers in India, since its commercial launch in mid-2012.

- The Indian government's vision of equipping students with tablets has been contagious with numerous countries also following the same path. Two large multi-million unit projects inspired by India's efforts include the Fatih project in Turkey and the One Tablet PC per Child project in Thailand.

## Manufacturing in India:

- DataWind has made a long-term commitment to manufacturing in India, despite significant obstacles and logistical difficulties. Local manufacturing helps generate jobs and allows for local innovation.
- DataWind continues to partner with local sub-contract manufacturers to produce the product and enhance their capabilities. While the current ecosystem of component suppliers in India is weak, over time such an ecosystem will develop only if local assembly and manufacturing is established.
- To increase the level of local value addition in the product, India's first touch-screen manufacturing facility has been established in Amritsar. The clean-room facility in Amritsar produces multi-touch projective capacitive touch screens utilized in DataWind's Aakash2 and UbiSlate tablet computers.

# Pre-paid Backlog:

 In addition to completion of the 100,000 unit Aakash project, DataWind announced today that it has also completed deliveries of its pre-paid backlog. Less than 1% of pre-paid backlog customers remain pending, due to lack of courier coverage or contact information. New deliveries for DataWind's UbiSlate devices are now processed within 72 hours.

# Next Tender:

- The specifications are being prepared by the appropriate government bodies for the next tender of Aakash devices (version 4), and it is expected to be an international tender with an open and transparent process. As per the vision announced by the Honourable Minister, we anticipate the features will include embedded cellular connectivity to allow anybody to take a basic SIM, use it as a phone and get anytime/anywhere internet access. Embedded cellular connectivity in Aakash4 will help herald India's internet revolution. DataWind looks forward to participating in the next tender and breaking further price barriers.



**Note:** 74,700 units have been delivered to and accepted by C-DAC, Noida and IIT-Bombay. 25,300 units are with Transporter in Noida awaiting processing of Letter of Credit documentation by IIT-Bombay.The 25,300 unit final shipments will be released by State Bank of India (IIT-Bombay's bank) upon endorsement of the delivery order, as per the Letter of Credit requirement established by IIT-Bombay.

**Controversies:** Significant efforts have been made by some to derail the project through nonsensical made-up controversies, fortunately they've all failed. The vengeance of such attacks and the glee displayed by some in claiming the demise of the project have made our resolve even stronger and we remain committed to persevering in breaking the affordability barrier, so that every citizen of the world can be empowered by the internet. To help set the facts straight, please find hereunder a list of the various issues and responses:

- Aakash1 saga: The first version of Aakash1 was based on specifications defined by IIT-Rajasthan. Indian government lab ERTL and Global testing leader BVQI tested and confirmed the quality of the product, against the specifications defined in the tender. Due to various reasons, IIT-Rajasthan resigned from the project, and it was transferred to IIT-Bombay. The reasons for the transfer of the project, the product's performance and IIT-Rajasthan's testing criteria are now past-history, which more than a year-back in March, 2012. Unfortunately certain media reports continue to represent the wrong chronological sequence of events and product reviews of the previous version which was obsoleted in March, 2012.
- Timelines: While much has been made in the media about missed deadlines, the reality is that the project has been completed within the time-frame of the contractual obligations between IIT-Bombay and DataWind. The key dates have been as follows:
  - May 16, 2012: IIT-Bombay establishes LC for start of Aakash2 project
  - August 29, 2012: Final specs approved for Aakash2 after product testing
  - Nov 5, 2012: IIT-Bombay accepts and issues Golden Samples. Contract allows for 6 month delivery period after approval of Golden Samples, resulting in a final delivery date of June 5, 2013 and order validity till June 15, 2013. The project has been completed by DataWind well within this time-frame
  - Nov 11, 2012: Launch of Aakash2 14,100 devices delivered
  - Nov 10 to Dec 14, 2012: Indian customs stops further clearances under IIT-Bombay's exemption certificates pending verification and reconciliation by IIT-Bombay.
  - Jan 2013: Datawind restarts manufacturing. After delivery of 3,000 units, by end of January, Customs again stops accepting IIT-Bombay's exemption certificates

# 

- Feb-Mar 22, 2013: Production lines lie idle, components sit at Customs incurring huge demurrage as customs again refuses to accept validity of IIT-Bombay's exemption certificates.
- Mar 23, 2013: Customs starts to accept some of the verifications/confirmations provided by IIT-Bombay and starts clearing goods.
- Mar 23 to May 1: Remaining 82,900 units are manufactured and shipped, despite ongoing difficulties in release by customs of certain components, non-acceptance of IIT-Bombay's exemption certificates and delays due to extension and processing of IIT-Bombay's letter of credit.

Through all this, the conduct of IIT-Bombay has been extremely professional and helpful in navigating through all these various hurdles. Specially this project wouldn't have been completed if it wasn't for the determination and guidance of Professor Phatak.

The vision of Honourable Minister KapilSibal, Honourable Minister PallamRaju and N.K. Sinha (who had been NMEICT Director throughout much of the project) has had an impact on global pricing of computing devices and will help create a measurable improvement in the quality of education in India.

- Made in India or Outside: Since there was no requirement under the tender or contract for the product to be manufactured in India, where it is made is not a controversy. Although there was a significant push from numerous sectors to have it all made outside of India, DataWind has persevered and helped establish four facilities that started manufacturing for it in India.
- Lack of content/applications: The project has been unfairly criticized for lack of educational content or applications. In reality the Aakash2 has been awarded as the best educational tablet at industry conferences. Please see section above on Content & Applications Ecosystem for further details.
- Government's purpose: Some have unfairly criticized the Indian government for deploying low-cost computing/internet access devices in education. DataWind commends the government's efforts in this regard, as they've brought their financial muscle to help drive pricing down, and their vision is being replicated by most countries globally. Studies by Prof. Sugata Mitra and others show that good quality teachers are unwilling to go to remote areas. Numerous studies globally show computing and internet can help with self-learning, and the world's premier universities now offer MOOCs (massive open online courses). With 70% of India's population living in rural areas, the benefits of providing internet access in a blended learning environment cannot be underestimated. Those that question the benefit of computing and internet access on learning do not understand education in the twenty-first century.
- Performance: While some have criticized the product's performance, many continue to highlight issues with the previous version which was obsoleted more than 12 months back, and don't



reflect the reality of the current product. Most critics that question the product's performance compare it to their experience with products that are priced ten times higher, and none offer an alternative product at a competitive price to the Aakash2. It is easy to criticize the product, but a crime to keep a billion people in India off the internet due to affordability.

 Why DataWind? Some criticized the awarding of the government's tender to DataWind, and recommend such projects should only be handled by large multinationals. DataWind had won the original tender through an open and transparent international tender that none of the multinationals bid. DataWind encourages all such critics to actively participate in the next tender for Aakash devices and help drive pricing lower for the betterment of humanity.

Through all this, the conduct of IIT-Bombay has been extremely professional and helpful in navigating through all these various hurdles. Specially this project wouldn't have been completed if it wasn't for the determination and guidance of Professor Phatak.

The vision of Honourable Minister KapilSibal, Honourable Minister Pallam Raju and N.K. Sinha (who had been NMEICT Director throughout much of the project) has had an impact on global pricing of computing devices and will help create a measurable improvement in the quality of education i