

Mathematician, physicist, and theologian, inventor of the first digital calculator, who is often thought of as the ideal of classic French prose. Pascal lived in the time when Copernicus' discovery - that the earth moves round the sun - had made human beings insignificant factors in the new disenchanted world. Facing the immensity of the universe, Pascal felt horror - "The eternal silence of these infinite spaces terrifies me." For him the world seemed empty of ultimate meaning or significance without Christianity, which he defended against the assaults of freethinkers. While Montaigne lived at ease with skepticism, Pascal was tormented by religious doubt, and took the question Why are we here?



startech@thedailystar

TECHSPOTLIGHT

Twin prodigies come up with mobile banking

RIDWAN A KABIR

THE greater prospects of mobile banking, not to be confused with the limited vista of the existing SMS banking offered by some of the local banks, has recently been worked out by two young software developers, who are waiting to take it to every doorstep of the nation.

The system, labeled 'ASD Mobile Banking System' (MBS), if implemented, promises to offer the convenience of almost all of the present day banking systems to the clients. 'ASD' stands for the company name, Advanced Software Development Ltd, a software solution firm integrated by the two young developers in recent times.

"With this banking system you can perform a wide range of query-based transactions from your mobile phone, and that is exactly how it is different from SMS banking systems," explains Mohammad Jamil Hossain, executive director of ASD, who is also in his fourth year at the Department of Computer Science and Engineering (CSE) at the University of Dhaka.

With SMS banking, one may only send a text message as a query and receive a reply from the bank's customer-service end. "Unlike SMS banking, you can actually perform real-time transaction directly through this system anytime from anywhere using your mobile phone, and without even making a phone call," Hossain stated, who was also speaking on behalf of the other branchchild behind the MBS project, Mohammad Sayedul Islam, director, Application and Web (ASD), a recent graduate from the American International University Bangladesh (AIUB).

While MBS carries the prospect of being pursued by the local banks, ASD will work with the banks to provide any technical and methodological support for implementation of the system in the banks' central server. "We will have at least two of our trained technical personnel working 24-hours for providing client satisfaction of the system," assured Hossain.

Under the system, the host bank will hold the copyright to offer this service to its customers, who will have to have a JAVA enabled mobile phone to have the associated software to be configured into the phone. The



account-holder or the credit card holder will then have to fill up a registration form for the bank, providing all necessary information, and the user will be notified from the bank with a message providing a personal-identification-number (PIN) code when the registration process is done in due time.

While a customer accesses the MBS embedded in his or her mobile, the very interactive user interface comes up on the screen, offering a choice of selection. On choosing a listed module, the gateway server at the bank-end is accessed via SMS, which is read by a SMS control agent, which interacts with the gateway server using microprocessor architecture language, and another program runs to identify the message for authenticity on user mobile number and the PIN that allows access to the gateway server prompted from the client-end. On clarity, the server applies the requested action and retrieves information from the central database to send into the

client mobile confirming pursue of the requested practice. "We may also provide training for the employees if the bank plans to build a 24-hour customer service for the MBS," stated Islam.

List of services used in the system includes -- personal account balance and transaction details, account-to-account money transfer, credit card balance and transactions, along with categorised push-services, where alert-messages will be automatically sent to the account holder's mobile based on preset criteria in case of balance falling below the preset amount, usage of credit amounts nearing a preset limit, or even past due-notices on loans and credit cards.

When asked about the security of the system, Hossain said, "Security issues are well-maintained in the application of the system," citing how any information sent out from the client-end or the server-end is completely encrypted, in case local hackers pursue their ways in

looking for the credit card numbers, or bank account numbers, or even the associated passwords. "We have developed an encryption and decryption algorithm, using 128 bits for the codes, for the sent and received information packages, both from the client-end and the server-end," he said, assuring how retrieval of information by any unauthorised access is thus completely prohibited.

"You can also pay your utility or phone bills through the MBS," cited Hossain, claiming these options will further enhance user experience for the service. As the user selects to make payments for such bills, the query will be read from the server end, and after listed verifications, the host-bank will make arrangements to pay the bills from the client's account.

Remarking on the aspects of losing the copyright of the product the executive director exclaimed how they are not worried about

other software inventors of the country to be influenced by their model. "We actually want it like that," Hossain stated, further adding, "Our model should be used as a prototype and people like ourselves should know about the existence of such a system." Hossain believes this will bring in a prospective level of technical competitiveness among the new-generation inventors of the country, essentially working towards building a cybernetic population in the upcoming years. "You will see a lot of local companies today trying to make the most even out of a small customer service software solution package, ultimately bringing up the price in millions at times, making it totally unavailable for the general citizen," he said. According to Hossain, an open market in the local electronic software industry is vital at this point to attain an even-distribution for such local productions.

TECHEVENT

Four make it through the Game Craze

SYED TASHFIN CHOWDHURY

DHAKA experienced a crazy gaming tournament as over 200 game freaks played a part at the preliminary rounds of the 'Game Craze' contest organised by Gigabyte and eBiz that shook the BCS City on July 6.

Only 19 qualified for the final event held the next day. Besides the participants, over 1000 gamers were present to feel the heat on both days.

The immense excitement and overall response from the city's gamers were greatly appreciated by the coordinators and organisers of the event.

"This enthusiasm portrays that the nation's youth are not lagging very far behind in the PC gaming sector," said M H Mishu, coordinator, Game Craze and In-Charge, Game Addicts Segment of the monthly eBiz.

The tournament was a random idea that popped out from some of the gamers associated with eBiz's gaming segment. Finally, with the help from Gigabyte, the tournament turned into reality.

"We wanted such a venue where a large number of

computers and immense speakers along with participants and audiences can be easily accommodated," said Mishu.

The application process started just three days before the preliminary rounds.

"Despite the short amount of time, we received applications from over 3,500 gamers of all ages from all over the country," said Mishu.

Science and ICT Minister Moyeen Khan unveiled the event on July 6, where 200 participants played Unreal Tournament, one of the most popular first person shooter games.

The chosen 19 qualified from 20 rounds while the rest returned home with attractive souvenirs.

The odds in the game were raised against these gamers during the final segment of Game Craze on the following day.

Wahid Hossain of Narinda fought his way to the fourth place while Shakawat Hossain Molla from Lakhmibazar secured the undaunted third position.

Murshid E. Saqlain, from Shyamoli, was the Game Craze runner up while Md.

Ashik Sharif became the Unreal Champion and also that of the Tournament.

A gaming PC was awarded to the Champion while other attractive prizes were awarded to other three position holders.

Despite overall appreciation of the event, a gamer pointed out that the games given away as souvenirs and the Unreal Tournament itself were pirated version, instead of the original one.

"The coordinators could have easily looked into the legal matters as they have already obtained a sponsorship from a reputed brand like Gigabyte," said Ronny, a gamer at the tournament.

The organisers of the event, however, replied that they were not doing anything illegitimate through the tournament.

"We are not doing anything wrong as there were no ulterior motive behind this tournament, apart from creating awareness among the youth and inspiring them," said Mishu.

The organisers of the event are also planning to organise a nationwide gaming contest in the near future.

GAMEFEST



A tiny tot engrossed in the third edition of Electronics Sports World Cup on July 6 at the Carroussel du Louvre in Paris. Eight hundred players from 52 countries are participating in role playing and strategic games in the edition.

PHOTOTECH



DINO TRACK

In this photo provided by the National Park Service 07 July, 2005, a track from a three-toed dinosaur thought to be about 70 million years old is measured in Denali National Park, Alaska. The track of a theropod, a meat-eater, discovered 27 June by a University of Alaska Fairbanks student, is the first dinosaur evidence found in the park. Scientists estimate the dinosaur was 9-13 ft (2.7-3.9 m) in length.

PHOTO: AFP

The DataCentre of The Future Today's Challenges

PART I

"The DataCentre of the future will be a simplified, commoditised, virtualised set of resources that is enabled by standards. Such standardisation of components and interfaces will enable the transformation of the DataCentre. The path of the forces that have shaped the DataCentre throughout its history is not that of a pendulum that reverses direction periodically; rather, it is the path of a ratchet that is inexorably evolving the DataCentre in a single direction: toward larger numbers of smaller, simpler, component systems that are more dynamically composed into solution systems via increasingly powerful networks."

META, "The Data Center of the Future," March 2003

There are many trends and technologies developing today that will shape the DataCentre of the future. Standardisation, utility and dynamic computing models, and scaling-out vs. scaling-up are important discussions for organisations of any size. However, there are a number of opportunities and challenges that IT organisations

currently face that must be addressed not only to meet today's needs, but to prepare them for the future. And, of course, this must be done while managing data growth, dealing with security, staffing and training, managing migrations and upgrades, and understanding new regulations. This guide is designed to provide information that helps organisations manage, plan and benefit from DataCentre technologies and transitions currently underway as well as those planned for the future.

Today's IT Challenges

IT organisations currently have an opportunity to address these issues through systems management processes and products, server and storage consolidation, virtualisation, and clustering technologies that improve utilisation and performance.

More than 90 percent of all server units sold today are standard x86 servers. The performance, reliability and value of x86 servers has enabled productivity gains and/or cost reductions for organisations of all sizes worldwide. With these benefits, however,



Proliferation of servers and storage devices causes systems management complexity.

Underutilization of server and storage resources creates less than optimal performance.

have also come challenges. Management of these systems is a major operational challenge. Servers and storage systems must be deployed, changes and updates made, and the systems regularly monitored for health and status. Change management has become one of the top issues facing IT organisations today. It is a function of the number of servers and storage devices multiplied by the number of updates and changes being made by the hardware, operating system and application vendors. With the number of

changes each of these different vendors is regularly making, change management has become a full-time job in many organisations. Another challenge is maximising overall system performance and utilisation. As organisations grow they require additional performance from existing assets. However, there has been a one application = one server reality that results in a large number of servers underutilising their true processing capacity.

To be continued...