



Xiaomi Redmi S2

What is it?
Xiaomi has proven itself as a maker of quality, budget devices that provide more bang for buck. The S2 aims at doing just that once again, preferably offering more than competitors at the same price range.

Design
All Redmi phones seem to go for that one standard look: rounded edges, flat back and glass front. It is familiar, appealing and comforting for those looking for something everyone is used to. What stands out rather too much are the sharply contrasting antenna lines. It was not cool when the iPhone 6 did it ages ago and it detracts from the overall continuity here as well. Antennas can be hidden and still work. The construction also incorporates a lot of plastic whereas Redmi has been known to offer a lot of metal in other devices. Simply put metal wears better than the easily scuffed plastic. The plastic makes it feel budget and that is a perception users want to avoid. Aside from that, the phone construction is solid, with easily accessible buttons and nicely centred fingerprint sensor at the back. The smoothly rounded edges allow you to hold the 5.9 inch phone quite easily without risking it slipping away. Guess that is one benefit to the plastic.

The phone comes with two SIM slots and a memory card in the tray which is a pleasant surprise. It also comes with an IR blaster along the top edge.

Display
The 1440 x 720 5.99 inch IPS display offers an 18:9 aspect ratio which is starting to become the standard fare even on budget phones. The 269ppi density provides plenty sharp enough resolution but the colours do tend to appear somewhat bluish and muted. It won't wow with the contrast or colour sharpness but it does get the job done. Bezels are quite pronounced in this day and age of large display smartphones.



Software
Being the Global Version, this device comes preloaded with all your Google services which are not the case with Xiaomi handsets for the Chinese market. No need to flash the ROM to install Google apps. The S2 comes loaded with Android 8.1 with Xiaomi's custom MIUI 9.5 skin over it.

The S2 does away with home, back and app buttons by replacing them with gestures similar to iOS. You need to go to settings and apply the full-screen display gestures. You then swipe up or from the sides to get to the menu or return to last apps. It is a rather cool feature and after a while, you wonder why the buttons are not gotten rid of from all devices.

The MIUI also features a Second Space option that allows you to load the same app under a different login ID. Two Facebook accounts for work and personal use? Keep them both on here.

Power
The budget-friendly Snapdragon 625 chipset is quite popular for mid-range devices and



has enough juice to satisfy most users. It occasionally shows some stutter while switching between apps but generally runs smoothly. We've tried a few of the newer games. 3D heavy titles will run but often have a little longer loading time.

Camera
Sony provided the 12+5MP rear camera units. They are nestled one above the other similar to an iPhone. Xiaomi loves Apple it seems. The secondary camera is to help with portrait and bokeh effects and considering the price, this does a remarkable job. The portrait mode works well if you have no objects in front of

THE VERDICT

Xiaomi has made an excellent budget device which is jam-packed with good features. The pros include a budget phone that looks and feels familiar yet comfortable and has excellent camera features. The UI feels smooth, comes loaded with Oreo and has a good battery life. A couple of big cons would be the plastic construction and screen offering muted colours. The white bezel on the rose-gold device also makes the bezel appear much too thick.

SPECS

Display: 5.99 inches, IPS LCD, 720 x 1520 pixels
OS: MIUI 9.5 based on Android 8.1 (Oreo)
CPU: Snapdragon 625
GPU: Adreno 506
RAM: 4 GB
ROM: 64 GB
Camera: Back-12 MP & 5 MP & Front- 16 MP
Features: Fingerprint (rear-mounted), accelerometer, gyro, proximity, compass
Battery: 3080 mAh
Price: Tk. 17,999/-



your subject. Otherwise, it tries to incorporate that as a sharply rendered portion leaving certain areas of the background un-blurred so to speak. Try to setup your subject against an uncluttered background in good lighting for getting excellent portraits. Speaking of portraits, the front camera takes excellent selfies in good light but suffers from some massive over correction in low light.

Image detail is very good but colours are little washed out. You can amp up the colours as you prefer in a third party editing app. I'm surprised the detail comes out this well considering the price point. And here's another camera related clincher: it features Electronic Image Stabilisation for a smooth, floaty video when you're on the move. While the 625 chipset supports 4k video recording, it does not come standard on the S2. Using the third party OpenCamera app allows you to record at 4k @ 30 fps with image stabilisation working. Go ahead, give it a shot.

Battery
A big phone with a non-demanding screen means it can easily top a day on its 3080mAh.

WORDS & PHOTOS: EHSANUR RAZA RONNY

Meet Bangladesh's future Mars explorer

When Dr. Asharaful Amin, associate professor and chairperson of Computer Science and Engineering Department of Independent University, Bangladesh (IUB), started to teach Robotics as a minor course for undergrad students, he did not expect much from his students. "Study of robotics in Bangladesh is still in its infancy. Our software-based job market offers little for a robotics graduate. In the beginning, very few students wanted to take this course."

Thanks to these few pioneering students and Dr. Ashraf's passion for robotics, IUB's robotics research team called "Team Attendant" has garnered a remarkable glory for Bangladesh. In 2017, the team, for the first time, participated in the University Rover Challenge, the world's premier international robotics competition organised by the Mars Society, Protocase and Microsoft at the Mars Desert Research Station (MDRS) in the USA. At that time, they secured the second position among all Asian contestants and 10th position globally.

This year, with their robot capable of exploring treacherous and unknown Martian terrain, analysing its soil and weather and of accomplishing servicing and rescue tasks, the team achieved the first position among all the Asian participants and achieved 6th position globally. Dr. Ashraf, the mentor of the team, says, "We were elated to see that we defeated all the top engineering universities of India. We even outperformed many top global universities like Stanford University, University of Michigan, University of Toronto and Monash University, Australia."

The Team Attendant's robot is a four-wheeled, electric motor-powered vehicle, similar to the ones we see on movies. However, this indigenously built rover is based on an aluminium suspension frame, making it lightweight and cost-effective. The suspension frame was designed to endure the bumps and humps of rocky, uneven terrain with a full load.

This ingenious design enabled the team to equip the robot with communication and navigation module, a remote-controlled drilling machine for sample collection, a mobile laboratory to analyse the weather and soil sample



and a robotic arm for rescue and repair operations- all within the strict weight limit of 50 kilograms only.

The team attendant's robot executed these tasks efficiently enough to be the champion in Asia and 6th in the world. However, manufacturing this complex device and participating in this competition was not an easy ride for Dr. Ashraf's team. Rashed, a member of the "Team Attendant" says, "We had to procure most of the motors and circuits from Dholaikhal. We had to repair those time and again to ensure maximum efficiency during the test. We had no experience in designing a robotic arm and suspension frame. We had to learn these complex techniques mostly from the scratch."

Nevertheless, the most significant of their challenges was an acute crisis of funds. According to Dr. Ashraf, "Manufacturing this robot and taking it to the USA wasn't cheap. We had to invest a lot of our time in seeking sponsorship. At one stage, the fund crisis became so severe that for a month I had to leave my work for fund raising. Thanks to their determination, IUB, ICT Division of the Bangladesh government's Ministry of Posts, Telecommunication and Information Technology, City Group and Energis Power Corporation Limited, Bangladesh came forward to support the pro-

ject. However, this came at a cost of invaluable time which could be utilised to make the robot more efficient.

This year, Team Attendant is again preparing for the contest with smarter and more sophisticated robot despite shortage of funds. "Armed with our two years of experience, we are now confident enough to compete for the global first position. We know our shortcomings and now we know how to solve those. However, still, we could not manage enough funds even to purchase the air ticket for our team members. If we can't secure funds within due time, I see no point of participating in the next contest," said a worried Dr. Ashraf.

This robot can be developed to perform tasks like automatic loading and unloading of heavy cargo, subterranean exploration like exploration and servicing operations in mines, detection, and deactivation of explosives and covert intelligence gathering tasks, Ashraf added. At this stage, all they need is a bit of support and patronisation to bring another glory for Bangladesh by taking the nation to the age of robots and space.

MD SHAHNAWAZ KHAN CHANDAN

Questioning Facebook's "Fair Play" Policies and Biases

THE STORY BEHIND
Facebook's privacy and data handling practices have been under major scrutiny ever since the Cambridge-Analytica scandal came to light. Facebook sold off data of around 87.6 million users to the now defunct British political consulting firm Cambridge-Analytica, which was then siphoned off to Donald Trump's associates. Well, today we are writing about the other allegation that Facebook has come under fire for, one that completely contradicts the Cambridge-Analytica Scandal. It's the notion that Facebook has an anti-conservative bias, pushing aside pro-Trump content.

THE CATCH
Now Facebook's anti Trump bias isn't a pressing issue, made less evident since Facebook already has a preferences tab for ads you would be interested in. But where's the catch? The catch is the timing of the recent anti-conservative allegations. Far-right websites such as The Gateway Pundit and Breitbart News Network have claimed that they are being censored on social media. Donald Trump's gotten behind these claims too, going as far as hinting at a possible anti-trust relationship between Amazon, Facebook and Google.

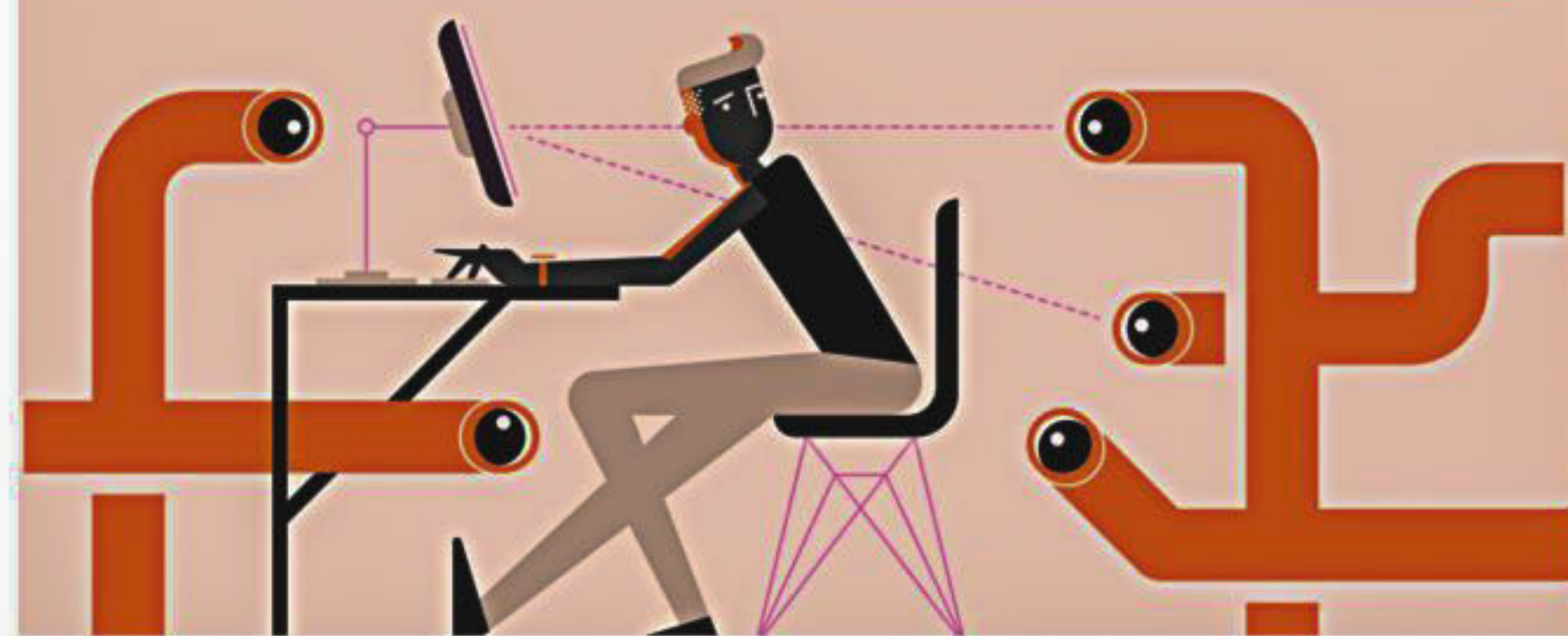
THE TIMING OR TRUTH
While these claims have hit

Facebook hard, they are hard to believe at face value. But if you take the Cambridge-Analytica scandal into context, can you really put it beyond Mark Zuckerberg and his team? More than that, these allegations should really raise some concerns for the next time you use FaceApp.

But you know what the scariest part is? It's how the Cambridge Analytica scandal played out. Aleksandr Kogan, a Russian American who worked at the University of Cambridge developed a simple Facebook quiz app called "thisismydigitallife" and the rest is history.

DOES THIS AFFECT US?
Facebook's basic algorithm focuses on your likes, viewed pages, videos and people you are simply "friends" with and feeds you content as such. To tie everything into a national context, you would not be viewing "guboj" if all the things stated above did not line up. But Facebook isn't supposedly filtering content here, or at least not to the extent that they have been accused of. Nonetheless, it's best to avoid quizzes and things on Facebook which gain access to your personal data for the time being.

ASIF AYON



Wish, Netflix, Uber and ~100 others testing WhatsApp's new Business API



To boost Amazon Pay in India, Amazon reportedly acquired Tapzo, an 'all-in-one' aggregator app, for \$40M



Apple will require all apps to have a privacy policy as of October 3



Google and Mastercard reportedly partner to track offline purchases



Chat app Line hopes its own crypto token can solve its user growth problem

