

Section 03. Smart Solutions in IT

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Important IT industry trends and their impact on software development

It's been a long time since IT was considered only as a narrow field of engineers' interests. Nowadays we can't imagine any business running without a whole software complex. Everyone knows that era of pens and paper is gone, but only those who are really into the topic know that computers are being driven out, too. World is rapidly changing and IT is at the head of the shift. So what are the most distinctive IT industry trends? The principal aspects of IT development are mainly dictated by the businesses' and customers' demand for real-time operations, mobility and increase of the data sets. Cloud technology is the trend of the last few years that tends to replace traditional computing. The age of big data, huge diversity of devices and constant multiplication of users imply faster and more flexible software. Cloud services provide their customers with all needed characteristics at the same time reducing costs for numerous hardware upgrades. On the contrary, considering rapid rise of cloud services, experts claim that users have to be highly warned about the security and privacy risks taken. Here hybrid clouds come to the point. Connecting assets of highly-protected private clouds and exceptionally productive public clouds, hybrid clouds are especially trendy among the chief enterprises. Another tendency in the IT industry already mentioned is big data analysis. Related to the cloud computing, big data represents a fundamentally new strategy of gathering, storing and searching for the information. Government, healthcare, education, media and other spheres, where the vast quantity of data inquires more complicated processing utilize innovative information assets of big data. The trend affects the demand for information management professionals worldwide. The next significant trend worth to be noticed in conjunction with cloud computing and big data is Internet of Things (IoT). Since 2014, all leading IT brands are focused on either IoT software or device working-out. First proclaimed in the late 90's, nowadays IoT becomes the most perspective brunch of IT development. An idea of all objects around us sharing data through the net turns out to be the most popular in transportation, architecture and healthcare branches. For today, GSM Association presents the most interesting outcome in the Internet of Things issue. Mobile Connect technology allows to identify users in different environment using mobile devices. Virtual reality makes the final considerable IT tendency. Samsung, Facebook and Google managed to show the best developments on its field. Actually, Daydream VR platform recently announced by Google might lead to the new level of mobile VR adoption. Decades of IT evolution demonstrate that we are constantly moving towards the age of enormous data flow. We need faster processing, advanced storages and new ways to protect loads of information merging on the Net. Internet of things, VR, Autonomous Agents and Things are bound to be useful all over the world. How soon the trends will come to life depends on businesses' and users' demand and their ability to unite interests.