Master Every Stage of Your Mobile App Lifecycle: Micro Focus Mobile Center
Master the Mobile App Era

Users expect mobile apps to be valuable, elegant, and useful, among other things. User experience is emotional and is driven by how users think, perceive, and feel. Most importantly, users expect mobile apps to work seamlessly, regardless of their choice of technology, their location, or context.

A good user experience is essential to achieving our business goals, whether it is transforming our customers’ experience, increasing workforce productivity, or growing revenues.

Delivering such an exceptional experience can be a daunting task. Mobile apps need to survive ongoing changes of the run-time environment, new devices, new operating system releases, etc. Any and all of these can lead to user frustration and app abandonment. Active apps demand constant care even if the functionality does not change.

On their own, mobile testing and analytics are valuable, but have their limitations. Testing alone only collects a small sample of data and is unlikely to represent how the larger population perceives an app, while analytic alone does not provide the full picture. However, they bring significant value when they are combined. Read further to understand how Micro Focus® Mobile app solution helps you measure the various attributes of the user experience—whether in our testing lab or in the wild—throughout the app lifecycle, and improve those that fail to meet expectations.

The Multi-Dimensions of the User Experience

- 61 percent expect apps to start in four seconds or less
- 36 percent stop using mobile apps because of heavy battery use
- 53 percent uninstall the app when it stops responding or crashes
- 6.5: The median number of vulnerabilities in mobile apps

Active apps demand constant care even if the functionality does not change.

Micro Focus Mobile Center

Mobile Center software is the single gateway that enables you to redefine the mobile experience by delivering a predictable and repeatable mechanism for testing, monitoring, and improving your mobile apps throughout its lifecycle.

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1 “Mobile App Usage and Abandonment Survey”, Dimensional Research, 2015
2 2015 Trustwave Global Security Report
Get Started

- All-in-one packaged solution
- 45-day trial
- Flexible licensing model
www.microfocus.com/mobiletesting

Easily Manage Your Devices, Apps, and Users with Mobile Center Centralized Hub

Mobile Center offers multiple hybrid cloud options for you to choose from. You can install Mobile Center behind your firewall for greater security and high-speed performance. Mobile devices and emulators can be connected locally or distributed, locked in a secure room, in Amazon Device Farm, and accessed remotely via a browser.

- Manage your devices
  - Filter your registered devices per model, operating system, form factor, availability
  - Get full control over a device, inclusive of system apps and remote restarts
  - Create device pools, schedule device reservations
- Manage your apps
  - Upload apps manually or trigger from your build server
  - Automatically deploy your apps on chosen devices and emulators via Micro Focus Mobile Center
  - Prioritize development and testing based on each app’s “FunDex” mobile user experience score
- Manage your users
  - Define users and teams
  - Define rules and permissions, including device access
  - View usage reports

“From a cobbled freeware mess of tools that didn’t talk to each other, we went to a single centralized platform that is both supported and upgradeable.”

JASON BRYANT
Mobile QA expert

Measure the User Experience from Day 1

Multiple studies confirm that the success of your mobile app—and potentially your business—depends on launch speed, performance, stability, battery usage, and other aspects of the user experience. By integrating in-app analytics to Mobile Center, you can start measuring the mobile app user experience—completely, correctly, and in real time. The goal is to measure everything that impacts the user experience, so the mobile team members can focus on the actions users care about most.

3 To help you get started and until Oct 31 2016, Micro Focus Mobile Center license includes an uncapped number of Micro Focus Sprinter licenses, one Micro Focus UFT and LeanFT concurrent license, two Micro Focus Network Virtualization licenses, free scans from Micro Focus Security Fortify, and one year of access to Micro Focus AppPulse Mobile, Micro Focus AppPulse Active and sentiment analysis.

4 Micro Focus Mobile Center requires a VPN connection to Amazon Device Farm.
Identify Performance Offenders Early

Network conditions can cause severe slowdowns in mobile apps, even when the users are using good quality networks, with the typical slowdown being in the range of 2X to 1000X the local performance. You simply cannot ignore the network.

Why Not Test Using Real Mobile Network?

Restricting testing against real networks dramatically limits the coverage to actual network conditions. It can also generate false results, and tests prove more difficult to reproduce. Such testing practice adds extra complexity due to the need to manage SIMs and contracts.

1. SIMULATE NETWORK CONDITIONS

Mobile Center allows network conditions to be profiled or sampled from live environments, which can then be replayed with very high fidelity during any cycle of testing (both functional and non-functional). As such, you can emulate real network behavior between components in the test environment including latency, packet loss, bandwidth limitation, and other behaviors of real networks.

2. IDENTIFY THE REASONS FOR SLOW PERFORMANCE

Most importantly, Mobile Center identifies the reasons for slowed performance and automatically provides optimization recommendations to allow your mobile apps to be remediated very early in the lifecycle.
Identify Security Vulnerabilities

The rapid adoption of mobile devices and the explosion of mobile apps have created a significant security challenge for organizations. Already stretched IT security teams are now responsible for mobile app security but often don’t have the resources and skills to thoroughly assess and score the risk in the rapid mobile deployment model. In addition, mobile apps are an easy target for hackers, putting your customers’ private data at risk.

With this in mind, Mobile Center provides a super-easy way of submitting your apps for security scans.

Figure 4. Device Technology

Figure 5. Security testing

Accelerate Manual Testing

Simply select one device from the device console, and Mobile Center automatically documents every action you take. Whether the device is in your hands or in another location, Mobile Center will stream, record, and document every interaction. Mobile Center generates mobile-specific reports, annotated screen captures, movies, and valuable device parameters. Testers can then provide clear, concise feedback on the design of the apps. This information accelerates collaboration between development and Quality Assurance teams, providing faster defect resolution and eradication. Most importantly, functional testing engineers can convert manual scripts into automated ones in a matter of seconds.
Automate Functional Testing

Mobile Center enables mobile testing teams to automate the testing of various aspects of the user experience. The solution is built to support frequent intensive regression and functional testing supporting agile and continuous development processes.

Mobile Center extends your functional testing tool to the mobile technology, giving you the ability to perform almost any operation on the devices (e.g., gesture, change in settings), cover any user scenario (e.g., test case across multiple apps, simulate events), ability to identify and manipulate objects to allow fast, easy, and maintainable cross-platform record and replay scripting.

Compatibility Table

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<thead>
<tr>
<th>Micro Focus Mobile Center core capabilities</th>
<th>Micro Focus UFT</th>
<th>Micro Focus LeanFT</th>
<th>Selenium</th>
<th>Appium</th>
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<tbody>
<tr>
<td>Continuous improvement</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
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<td>Lab management</td>
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<td>Device technology</td>
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<td>Synthetic monitoring</td>
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<td>Functional testing</td>
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<td>Security testing</td>
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<td>Mobile analytics and feedback</td>
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<td>Interactive testing</td>
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<td>Performance testing</td>
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Figure 6. Interactive testing

Figure 7. Functional testing
Plan, Run, and Scale Mobile Performance Testing

Mobile Center solves the mobile performance-testing problem by providing insight into how an application will perform under a geographically dispersed load. Mobile Center makes it easy to record test scripts directly from your mobile device or on your test station and exercise on real devices. As a result, you can design, develop, and execute performance load tests, identify bottlenecks, determine system capacities, and measure the real user experience earlier and more often in the development-test cycle.

Compatibility Table

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<th>Micro Focus StormRunner</th>
<th>Micro Focus LoadRunner</th>
<th>Micro Focus Performance Center</th>
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<tbody>
<tr>
<td>Micro Focus Mobile Center</td>
<td>Yes</td>
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Know How Your Applications Perform—Anywhere, Anytime

Once your app is live on the app store, Mobile Center will proactively monitor its performance and availability by simulating critical users’ actions on real mobile devices and live wireless carrier connections.

- **Active monitoring**: Leverage our synthetics transaction robots to simulate user sessions to ensure application availability and performance. Get the visibility you want from inside or outside your firewall and around the world.
- **Fast setup, easy interface**: Set yourself up within minutes. No agent to download or deploy. Use our out-of-the-box monitors to get up and running quickly. Our simple, powerful UI delivers detailed information you need to confirm quality of service.
- **Predictive analytics**: Leverage historical performance baselines to predict future issues. Forget manual SLAs. Dynamic thresholds and automatic alerts notify you the instant you deviate.

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Figure 8. Performance testing

Figure 9. Synthetic Monitoring
Gain Insights into Your Users’ Feedback

- It is critical to understand how users perceive our app by analyzing their comments on the app stores.
- Mobile Center provides you with a sentiment analysis service that will scan end-user comments on your applications, categorize them, and provide a weighted score.
- You can now easily see what your customers are saying, and address their concerns by focusing development and testing on the right priorities.

Learn more at www.microfocus.com/mobiletesting

Figure 10. Mobile analytics and feedback