



Global WebSphere Community (GWC) Spot-Light Article Application Middleware Management Focus

Imagine you are providing IT services for a financial institution. It is 10 minutes to 4pm (when the markets close) and \$20M worth of electronic transactions has gone missing. If the trades are not completed, the financial institution will not only be liable for regulatory fines but also for interest foregone and, potentially, any price change that occurs the next day. The department providing the services will be taken to task or worse if it proves to be an IT issue that has caused the problem. This is a scenario that is not as uncommon as you might think. The financial implications are unpleasant. The customer relationship and internal management implications may be worse. This happens in other industries such as travel, retail, manufacturing as well; anywhere that sophisticated technical environments operate.

Traditional Systems Management Can Be Insufficient

The technical environment depicted above is a real life example. The infrastructure is comprised of an extensive network of IBM's WebSphere Application Servers and WebSphere MQ servers running on everything from zOS mainframes to HP nonstop servers to many flavors and instances of UNIX, Linux and Windows. These middleware servers provide the mission critical foundation that carry transactions to different businesses and applications.

Availability and reliability are critical both to commercial operations and, in the case of travel industries, safety. While standard industry monitoring solutions worked fine when the world was simpler and managed in silo'd environments, like everything else, the world has changed.

Managing widely distributed environments among many business units and across varying geographies is now more the norm. It is no longer safe, expeditious, or even possible in some cases, to roll out monitoring agents across an entire global business environment; never mind testing them. The cost of doing business this way is prohibitive and limited in scope and ability.

Making a Choice

Avada Software is the only vendor whose monitoring solution – Infrared360 – scales to thousands, not hundreds, of managed middleware endpoints from a *single* server without deploying *anything* (no agents, no scripts, and no programs) to those endpoints. There is *nothing* to deploy on client desktops either. Infrared360 is a 100% web application; not partially web, partially client. It doesn't even use applet technology (which is essentially a client and requires firewall configuration allowances).

Infrared360 was created with two goals in mind:

- 1) Reduce the time of initial and subsequent deployments of middleware management tools
- 2) Allow infrastructure groups to collaborate in problem solving without compromising security in any way; in fact enhancing it in a way that allows corporations to leverage, not segregate staff.

Results

The result is that *any* costs, like those described above, are taken *out* of deploying and running a management and monitoring solution, directly improving the bottom line.

Improved Management

Alerts are the bedrock of systems management. When a threshold is exceeded, someone is notified, then investigates and remedies the outstanding issue. While in principle this works well, the downside is that the alert can be sent to a large number of people and can cause one of two effects:

- The first is that nobody does anything (thinking that someone else is dealing with it)
- The second is that too many people become involved — and too many are ‘contributing’ to the resolution, an extremely wasteful use of precious skills and resources.

Using Infrared360, our customers are able to quickly create or modify complex, cascading alerts that notify only the people that matter for that business unit or application. But the magic is not only in doing it; it's doing it *without* using rule engines, scripts, or programs of any type.

Automated Problem Correction (self-healing)

The traditional solution sequence was to solve each issue as the operator encountered it. The response of this ‘alert’ normally would be for a support person to try their hand at correcting the problem and then escalate to a system administrator if needed. But there are many situations where there may be more complex reasons to trigger an alert. This compound grouping of issues usually entails scripting, rules engines, or complicated configuration files. Infrared360 requires simply the *selection* of the different events.

Using Infrared360, the remedy to the event can then be enabled via a graphical association of the alert with any *services* referenced by the product (email, sms, web services, logging, home grown scripts, remote processes, etc.). There is no user intervention required if the criteria for a given alert are satisfied and the associated steps are taken by the product. In some instances, Avada Software customers have seen the time for problem resolution and remedy drop from 7 hours to 30 seconds.

Collaborative Problem Solving

Traditional ad-hoc problem solving involved a single administrator working deftly via an administration client connected to a targeted problem on a server. But what if that problem area comprised multiple servers and what if a change needed to be made to multiple objects on those multiple servers at pretty much the same time? And more so, what if another business unit or person was needed to review, interact, or verify that the proposed changes would in fact correct the issue?

Infrared360 allows administrators and the business unit's subject matter expert to share and view *only* the problem environment – while limiting the collaborating subject matter expert to attend to the problem with only the permissions to assist, not effect, changes themselves. Infrared360's innovative solution allows quick pinpointing of the problem area without the need to sift through dozens or perhaps scores of servers and screens of information in order to even find the problem area.

Raise Your Expectations

In the mobile communications world, smart phones offer the capabilities people need while maintaining the simplicity they want. There is no reason why it should be any different for enterprise management solutions! Avada Software's Infrared360 is simple but powerful, powerful but intuitive.

Infrared360 Middleware management portal provides administration, monitoring, statistical reporting, and testing for WebSphere MQ, WebSphere Message Broker, Tibco EMS, JMS messaging – including WebSphere, jBoss, and Tomcat Application Servers as well as Web Services.