



## Delay Measurement

There are different ways to measure system delays. Each measurement gives valuable information. Some forms of measurement make it easier to improve and to evaluate system performance.

### Third Next Available Appointment

The third next available appointment is a measure of system capacity. This metric looks to the future for the third next available time for a specific service, i.e. an appointment. The assumption is that while the first next available appointment may occur because of a late cancellation or some “noise” or exception in the system, the third next available appointment will accurately measure where there is actually future open space. Thus, this measure looks for a potential appointment. This measure is valuable because it is not influenced by patient intent which is very difficult to measure or monitor. In a sense, it does not matter what the patient wants because if the delay for third next available appointment is short, a patient can get any requested appointment with minimal delay.

### Actual Appointment Delay

This metric measures the time delay between when the patient requested an appointment and when the appointment was delivered. While this metric does measure actual system performance, it cannot account for patient intent. If patients all want future appointments, the metric shows delay. In contrast, the third next available demonstrates potential system performance in all settings regardless of patient intent. A short delay in third next available appointment demonstrates that the system can deliver anything and, while, a short actual appointment indicates the same, because of patient preference it is difficult to obtain a short delay for actual appointment. Thus, since this measure is rarely very short, it is difficult to decide what optimum improvement is whereas optimum improvement in third next available appointment is easy to see.

### Future Open Capacity

Optimum improvement in a system measured by third next available appointment is achieved when the system delay is constant at one day. When this measure stabilizes at that level, measuring the future open capacity is a better measure of system “health.” The future open capacity measures the percentage of open future schedules - the percent of backlog or percent of the future capacity that is pre-booked over the next period of time. This is usually measured for the next four weeks at daily or weekly intervals. When used along with the third next available appointment, a clear view of system performance can be obtained.