To help overcome the limitations of a simple array, the .NET base class libraries ship with a number of namespaces containing *collection classes*.

Unlike a simple C# array, collection classes are built to dynamically resize themselves on the fly as you insert or remove items. Moreover, many of the collection classes offer increased type safety and are highly optimized to process the contained data in a memoryefficient manner.

Generic collections (primarily found in the System.Collections.Generic

namespace)

* Generics provide better performance because they do not result in boxing or

unboxing penalties when storing value types.

• Generics are type safe because they can contain only the type of type you specify.

• Generics greatly reduce the need to build custom collection types because you

specify the “type of type” when creating the generic container.