

W02 Prove: Articulate—Abstraction

Abstraction is the ability of changing very complex ideas, into simple ones, by removing by keeping/showing only what is absolutely necessary. As benefit, this allows programmers of creating modular and reusable code, for example that is easier to understand and to be used. A great example of this are the softwares created to handle complex tasks of machinery. An application of Abstraction can be the “Journal” class itself, used on this week’s “Prove” assignment. It encapsulates the several functionalities described to the user through the options of the menu without showing the internal implementation details. As a code example:

```
public class Journal
{
    private List<Entry> entries;

    // Properties

    public void DisplayJournal()
    {
        // Abstraction: Hides the internal implementation details
        foreach (var entry in entries)
        {
            // Abstraction: Displays entry details without exposing the internal structure of
            Entry class
            Console.WriteLine($"Date: {entry.Date}");
            Console.WriteLine($"Prompt: {entry.Prompt}");
            Console.WriteLine($"Response: {entry.Response}");
            Console.WriteLine();
        }
    }
}
```