# Verification and Validation Report: Measuring Microstructure Changes During Thermal Treatment

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# 1 Revision History

Date	Name	Notes
Mar 8 2023	Edwin Do	Added usability test results

#### 2 Symbols, Abbreviations and Acronyms

change capacity to size

symbol	description
Т	Test

[symbols, abbreviations or acronyms – you can reference the SRS tables if needed —SS]

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This document ... Section 11 Code Coverage Metrics is removed.

- 3 Functional Requirements Evaluation
- 4 Nonfunctional Requirements Evaluation

In the section

#### 4.1 Usability

The table below shows the results of our usability tests based on the tests in the V&V plan based on the requirements mentioned in the SRS. Each requirement can be traced to multiple unit tests and the usability survey used can be found in the Appendix.

Usability Tests						
Requirement	Related Unit Tests	Description	Expected Result	Result		
NF-UT1	AF	Completing tasks without additional assistance.	User will be complete tasks successfully	PASS		
NF-UT2	AX	Interact with interace to modify parameters.	User will be able to modify the parameters accurately and quickly.	PASS		
NF-UT3	AL	Completing all tasks with limited number of mistakes	User will be able to complete all tasks with MAX_MISTAKE	PASS		
NF-UT3	AL	Verifying if interacting with the application previously improves ease of use (learnability)	User will be able to complete the tasks more quickly and accurately the second time	PASS		
NF-UT5	AS	Verifying how calculations are performed is hidden	User will not know how calculations are performed after doing the set of tasks	PASS		
NF-UT6	AS	Verifying appropriate application size upon installation	User will install application onto computer and verify that the application size is less than or equal to MAX_SIZE	PASS		

- 4.2 Performance
- 4.3 etc.
- 5 Comparison to Existing Implementation

This section will not be appropriate for every project.

- 6 Unit Testing
- 7 Changes Due to Testing
- 8 Automated Testing
- 9 Trace to Requirements
- 10 Trace to Modules

References

## Appendix — Reflection

The information in this section will be used to evaluate the team members on the graduate attribute of Lifelong Learning. Please answer the following questions:

- 1.
- 2.