

# **TESSOLVE SEMICONDUCTOR TEST ENGINEERING LAB FOR STE-SDC COURSE**

## **Training Partner Agreement Between Tessolve & RAMCO Institute of Technology, Rajapalayam.**

2<sup>nd</sup> Jan 2023

**Tessolve Semiconductor Pvt Ltd**  
Plot No. 31 (P2), Electronic City Phase II  
Bangalore 560100, India  
T: +91 80 4181 2626  
F: +91 80 4120 2626  
W: [www.tessolve.com](http://www.tessolve.com)

### **About Liquid Instruments**

TESSOLVE SEMICONDUCTOR PVT. LTD.  
Plot No.31 (P2), Electronic City, Phase II, Bangalore – 560 100, INDIA T: +91 80 4181 2626 F: +91 80 4120 2626  
W: [www.tessolve.com](http://www.tessolve.com) CIN: U72300KA1993PTC034929 ISO 9001 : 2015

Liquid Instruments, an innovator in precision software-defined instrumentation, launched Moku:Go, a complete, portable platform designed to bring the engineering lab anywhere and usher in a new era of scientific and engineering education at universities around the world.

*Moku:Go offers a complete set of instruments and features designed to help science and engineering students push past the traditional boundaries of teaching labs and classrooms.*

It starts with 8 proven, powerful instruments including an oscilloscope, PID controller, logic analyzer, arbitrary waveform generator, data logger, spectrum analyzer, Power supply, Waveform Generator. It also features full connectivity with a Wi-Fi hotspot and USB-C, robust hardware features and electrical protection . The platform supports Python and MATLAB APIs.

## About Tessolve Semiconductor

Tessolve, an ISO 9001:2015 certified company, is one of the world's leading Semiconductor Engineering solutions provider. Tessolve offers engineering expertise in the areas of Semiconductor IC Design, Test & Product Engineering, PCB Design, Failure Analysis and Systems Design under one roof. Tessolve's goal is to be an extended arm of Semiconductor product companies and enable them to ensure good quality productization of their chips in a cost effective manner.

Since its inception in 2004, Tessolve has grown from strength to strength. Tessolve currently has over 2000 employees with offices in Bangalore, Coimbatore, Bhubaneswar, Vizag, Singapore, Malaysia, USA (Santa Clara & Dallas). Tessolve engineers have executed complex projects for several leading semiconductor companies.

## Background

Semiconductor devices today integrate a wide range of components of an electronic system (computation engine, memory, logic, power management, mixed signal blocks etc.) into a single multifunctional device. There is incredible convergence between handheld, automotive, and home electronics technologies. The semiconductor Industry is also levered strongly to the growth prospects of Internet of Things and Big Data. The global semiconductor market was valued at \$555.9 billion in 2021, and is projected to reach \$1,033.5 billion by 2031.

Testing a chip is a critical step in the design cycle for semiconductor IC companies. Today's chip testing involves high cost equipment and experienced engineers. The Indian market is also now moving towards making our own physical chip, which will require testing, characterization and qualification in India. Not only the big chip makers but also Indian origin design houses and IP providers will need testing of their devices to contribute to the upcoming chip manufacturing in India.

**Semiconductor Automated Test Equipment (ATEs)** are used for testing memory, digital, mixed signal, power management and SoC components, both at the wafer level and package level stages.

Engineering graduates, who comprise two-thirds of the entire workforce, form a major part of the Semiconductor testing industry. **The industry goes through six months to a year for the Engineering graduates from college to become deployable and industry ready.** There is a continuous shortage and high demand for qualified test engineers every year. Meanwhile, university and engineering institutions lack the specialized ATE training skills, as they cannot afford the financial outlay for high cost Semiconductor Test Equipment required for such training.

Tessolve & Liquid Instruments have overcome this academia problem by providing a novel concept of owning a low cost Test Training Kit– **Moku:Go** by the Institution (referred as Training Partner). To understand the electronics and device test theory, Moku : Go is the ideal training vehicle to learn and develop the talent and skillset for the Semiconductor Engineering industry.

Tessolve Semiconductor is offering **Semiconductor Test Engineering - Skill Development Course [STE-SDC] certification course** that will be offered to the Training Partner's teaching faculty so that they can train their students at their campus. The rationale behind this STE-SDC Certification approach is to introduce the students as soon as possible to real world test program development so that they can bridge the gap between academic learning and job-oriented skill set required in the industry in a shorter duration.

Tessolve & Liquid Instruments will continue to work with Indian academia to support skill-oriented training in field of semiconductor test and measurement.

## Training Partner Agreement

This Agreement, effective January , 2023, is between Tessolve Semiconductor Pvt Ltd, having an office at Plot No. 31 (P2), Electronic City Phase II, Bangalore 560100 and RAMCO Institute of Technology, Rajapalayam.

The Ramco Institute of Technology henceforth known as the “Training Partner” hereby agrees to participate in setting up a Tessolve Semiconductor Test Engineering Lab and offer the STE-SDC course for engineering graduates, subject to the following guidelines.

### 1. Objective

The objective of TSTE Lab is to offer **STE-SDC** Course to ECE/EEE/IE undergraduate students.

### 2. Term

The term of this Agreement shall be for 3 Years commencing on 2<sup>nd</sup> January 2023 renewable by the parties with mutual consent.

### 3. Terms & Conditions for setting up the TSTE Lab and conducting the STE-SDC course

- a) Tessolve selects the Training Partner based on factors like qualification of the training staff, location and capabilities to handle the training.
- b) Tessolve will train the Trainers once the qualified college/institutes signs the Training Partner Agreement.
- c) Tessolve will conduct a selection process at partners college to identify the eligible candidate for the training. The train must begin, post-selection process, and once the LOI is issued.
- d) Tessolve will recommend the batch size depending on the infrastructure provided by the Training Partner and the total number of candidates selected for the year.
- e) Tessolve will provide the course content to be used by the Training Partner.
- f) The Training Partner will be responsible for promoting awareness about the STE program and ensuring a considerable number of candidates participate

TESSOLVE SEMICONDUCTOR PVT. LTD.

Plot No.31 (P2), Electronic City, Phase II, Bangalore – 560 100, INDIA T: +91 80 4181 2626 F: +91 80 4120 2626  
W: www.tessolve.com CIN: U72300KA1993PTC034929 ISO 9001 : 2015

- in the selection process. The partner should ensure that once the candidate accepts the LOI from Tessolve, they don't appear for another interview with other organisations. It's also the partner's responsibility to train the selected candidates in the said period while the program's quality is taken care.
- g) Training Partner will be responsible for conducting the training and coordination with Tessolve for the assignments.
  - h) Tessolve will carry out periodic visits to the TSTE Lab for assessments during the STE-SDC training.
  - i) Training Partner will maintain day-wise attendance record for the batch and provide it to Tessolve during the assessments.
  - j) The STE-SDC Certification course can be offered full time or part time.
  - k) The Training Partner will conduct STE-SDC examination at the end of the course.
  - l) All candidates, upon successfully qualifying Tessolve's examination, will be provided STE-SDC Certification.
  - m) Training Partner is allowed to charge a nominal fee from students.
  - n) Tessolve shall participate in delivering Technical Lectures on Semiconductor Test Engineering Topics by delegates from the industry.
  - o) Students hired by other organizations will not be eligible for STE-SDC Training.
  - p) Based on Tessolve's hiring requirement from time-to-time, Tessolve should be given the highest priority to hire the required number of students who have qualified from the Tessolve's selection process.
  - q) Tessolve Semiconductor Test Engineering Lab includes STE-SDC courseware and Liquid Instruments' s Moku: Go kit. After successfully obtaining the STE-SDC Certification by Tessolve, the engineer will be able to demonstrate Proficiency in Test Methodologies like test program development and troubleshooting skills for ICs.
  - r) Tessolve holds the right to withdraw the permission to setup/operate the TSTE Lab at any time if the Training Partner fails to comply with the above guidelines.

#### 4. Other Engagements

The Training Partner agrees that they would conduct trainings with this objective only under the association with Tessolve. During the validity of this Partner Agreement and even after the validity is over, in case the Training Partner intends to associate with any other organization for conducting a similar training, they should first seek a written permission from Tessolve before making any plan.

## 5. Termination

Either party, upon giving not less than thirty (30) days written notice, may terminate this Agreement. The thirty (30) day termination period shall not begin until the other party has received or is deemed to have received the notice of termination.

## 6. Entire Agreement

This agreement constitutes the entire agreement and final understanding of the parties with respect to the subject matter hereof and supersedes and terminates all prior and/or contemporaneous understandings and/or discussions between the parties, whether written or verbal, express or implied, relating in any way to the subject matter hereof. This Agreement may not be altered, amended, modified or otherwise changed in any way except by a written agreement, signed by both parties.

## 7. Confidentiality

Training Partner agrees at all times during the term this Agreement and after the termination of this Agreement to hold in strictest confidence, and not to use, or to disclose, transfer or reveal, directly or indirectly to any person or entity any Confidential information without the prior written authorization of the other party. Confidential Information includes, but not limited to, Training Material, Manuals, Circuit diagrams, Presentation PPTs, names of investors, buyers, sellers, borrowers, client lists, financial information and trade secrets about the products and information or other proprietary information relating to designs, formulas, developmental or experimental work, know how, products processes, computer programs, source codes, databases, designs, schematics, or other original works of authorship.

Each party hereby agrees that all information provided by the other party and will be treated as confidential and the receiving party shall not make any use of such information other than with respect to this Agreement. If the Agreement shall be terminated, each party shall return to the other all such confidential information in their possession, or will certify to the other party that all of such confidential information that has not been returned has been destroyed.

## 8. Assignment

This Agreement is valid only for the Training Partner who have signed with Tessolve, and is not transferable or sub-contractible to any other third person or entity.

TESSOLVE SEMICONDUCTOR PVT. LTD.

Plot No.31 (P2), Electronic City, Phase II, Bangalore – 560 100, INDIA T: +91 80 4181 2626 F: +91 80 4120 2626  
W: www.tessolve.com CIN: U72300KA1993PTC034929 ISO 9001 : 2015

IN WITNESS WHEREOF, M/s. Tessolve Semiconductor Pvt. Ltd. and the Training Partner have entered into this agreement and agree to the above terms in their entirety.

For Tessolve Semiconductor Pvt. Ltd.

*ARajaku*

**Mr. Rajakumar D**

Vice President – Operations

For RAMCO Institute of Technology,

Mr. \_\_\_\_\_

*(Principal)*  
PRINCIPAL

Designation

Ramco Institute of Technology  
Rajapalayam - 626 117



1. *[Signature]*  
K.S.SELVARAJ  
GM - (Admin) RIT  
Rajapalayam.

2. *[Signature]*  
29/3/23  
(P.SURESHKUMAR)