# **Tiago R. Schambach**

# (760) 5125038 // Tiago\_Schambach@hotmail.com

**IndustRY Experience**

 **Lead Chemist**

July 2019 – March 2020

Cottonwood, AZ

 **SYO Labs**

*Supervisor: Jeremy Bach*

* Plan and assist with facility build out.
* Train personnel on large scale CBDa and CBD crude production (>350L per week).
* Implement and oversee new equipment installations and projects (distillation and post extraction processing).
* Work closely with QA/QC departments to create batch records and metrics tracking systems.
* Worked hands on with short path wiped film distillation units (Prescott P-1000), falling film evaporator units, rotary evaporator solvent recovery systems, various pressure vessels for solvent heating, transfer, storage, extraction and decarboxylation.
* Average crude potency was greater than 65% CBD, >70% TAC.
* Company temporarily shut down due to COVID-19 related financial issues.

 **Lead Chemist**

February 2019 – July 2019

California City, CA

 **California City Refinery/ Big-O Relief**

*Supervisor: Joe Ordaz*

* Prepare incoming crude for distillation via decarboxylation and winterization.
* Perform distillations using Precision CDU-1000 short path wiped film distillation unit.
* Train incoming personnel on decarboxylation, winterization, and distillation.
* Support formulation and post-processing operations.
* Company shut down due to funding issues.

 **Extraction Technician**

November 2017 – June 2018

Los Angeles, CA
Greenfield, CA

 **LoudPack Farms, Inc / KingPen**

*Supervisor: Michael Corral*

* Perform Live Resin extraction using ExtractionTech System’s ETS MEP.
* Products included: Sauce, budder, badder, shatter, sugar and crude.
* Keep logs of incoming fresh frozen, plan extraction runs for specific products, work with product development teams to make new lines.
* Briefly worked with winterization, decarboxylation and distillation using ChemTech Services, Inc’s KD-6,10, and 30 series distillation units.
* Left company to pursue other opportunities with more responsibilities.

 **Lab Technician**

May 2017 – November 2017

Escondido, CA

 **Isodiol International**

*Supervisor: Steve Kay*

* Perform quality control inspection on outgoing product labels.
* Research new CBD Based products for marketing.
* Perform physical labeling and packing of products.
* Maintain good laboratory notebook and regularly audit inventory.

**Education**

**Universidade Federal de Santa Catarina, SC Brazil**

2008 – 2012

B.Sc., Major: *Chemistry;* Adviser: Professor Moacir Geraldo Pizzolatti. Senior Project: Phytochemical Analysis of *Croton heterodoxus* Bailon and Search for Terpenoids and Flavonoids.

2013 - 2015

**Universidade Federal de Sanata Catarina, SC Brazil**

M. Sc., Major: *Analytic Chemistry;* Adviser: Professor Gustavo Amadeu Micke.

Thesis:Development of a Rapid Methodology of Separation and Quantification of Tobacco’s Major Alkaloids by Capillary Electrophoresis

 **RESEARCH Experience**

2009 - 2012

Santa Catarina, Brazil

**Research Assistant**

 **Professor Moacir Pizzolatti, Universidade Federal de Sanata Catarina**

* Separate and isolate secondary metabolites of plants using various chromatography techniques.
* Perform isolation of, structure analysis, and biological assays of active compounds in medicinal plants of the catarinian flora.
* Identify and characterize natural products using NMR, UV-VIS, IR, melting point, mass spec and other physical characterization assays.
* Perform various types of plant matter extraction.

2013 - 2015

Santa Catarina, Brazil

**Research Assistant**

 **Professor Gustavo Micke, Universidade Federal de Sanata Catarina**

* Perform extraction of tobacco alkaloids.
* Determine properties of tobacco alkaloids and nicotine salts via capillary electrophoresis
* Perform HPLC analysis on tobacco alkaloids.

**Skills**

 **Languages:** English (Native), Portuguese (Native), Spanish (Conversational).

 **Life Sciences & Wet Lab:** Capillary Electrophoresis, HPLC, filtration, sample prep.
**Cannabis Manufacturing:** Short path wiped film distillation, short path glass distillation, winterization, clarification, de-gumming, pesticide removal, decarboxylation, SOP and batch record development, track and trace, sterile technique, BHO Extraction (Sauce, shatter, crude for distillate, batter/budder/whipped), Ethanol Extraction (large scale crude production) CBD distillation, crystallization, formulation.