

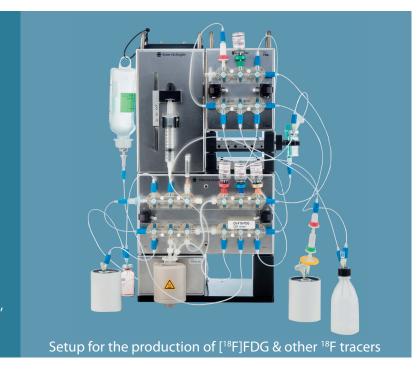
Innovative and up to date

The Modular-Lab PharmTracer was successfully introduced to the market in 2009. It was the first flexible solution available for the labeling of C-11 and the production of F-18 based tracers on one system. Since then we have improved our performance to continuously appeal to the changing requirements of our customers with new concepts to add templates for new tracers.

Modular-Lab PharmTracer At a glance

- Cassette based synthesizer
- Routine production & research
- Modular approach
- Self explanatory, intuitive software
- Fully compatible with Modular-Lab technology
- Designed for future expandibility
- New tracers in development

Nuclide Focus: Fluorine-18, Gallium-68, Carbon-11, Copper-64, Lutetium-177, Yttrium-90, Indium-111



Cassette diversity - sterile & disposable

- Sterilized with gamma-radiation (validated process; ISO 14644-1)
- Double vacuum-packed with a shelf-life of 18
- Produced under GMP-compliant clean room conditions

Customized solutions can be developed on request!



Eckert & Ziegler Radiopharma

Our Promise

Reliable products Innovative and compliant solutions Quality and passion driven services

Our Services

Radiosynthesis devices and consumables

Quality control equipment

⁶⁸ Ge / ⁶⁸ Ga Generators

Longer lived radioisotopes for pharmaceutical applications

Hands-on Workshops

User Meetings and Trainings on all our devices

Custom tailored applications (e.g. automation of manual processes)



Radiosynthesis Technology



Radiochromatography



Radionuclides

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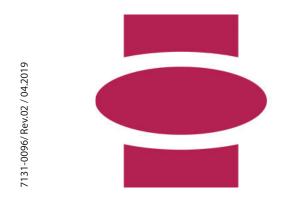
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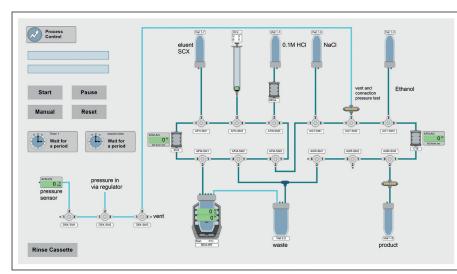






Design your own cassette based synthesis

Use our pre-validated synthesis templates or generate your own synthesis projects using the Modular-Lab software. The software is compliant to GMP, cGMP, GAMP 5 and 21 CFR part 11 regulations. Four defined security levels meet all demands for the security of the process data and the application-specific setup.



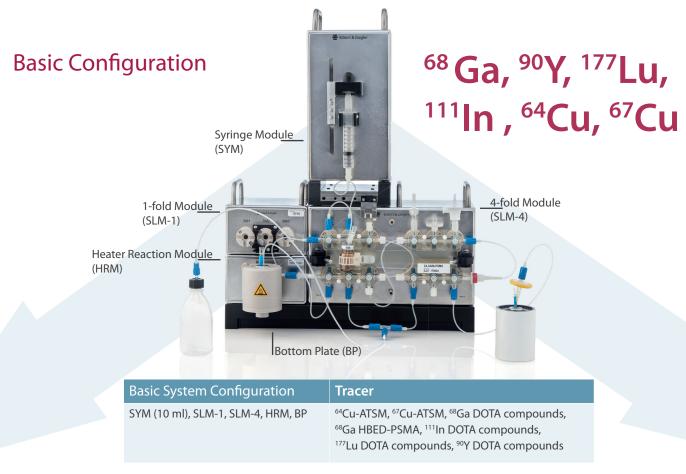
Modular-Lab software user interface

Programming is very easy and works via a self-explanatory graphical user interface. Simply program a process with drag & drop of graphical symbols.

Versatile, fast setup and easy handling

Modular-Lab PharmTracer is based on our unique modular approach. The concept of stacking modules on top of each other and easily rearranging the system

setup, enables routine production and research on only one system! Hence, allowing for cost & space efficient production of different radioactive compounds.



Optimize your workflow by choosing from a large range of different modules and add on to the basic configuration!



Recommended for Gallium-68

Add-on: A $[^{11}C]CO_2$ trap enables the system to produce ^{11}C based tracers via wet chemistry. For the synthesis of these tracers a 20 ml syringe module is required.

Configuration

System Configuration	Tracers
Basic system configuration with SYM (20 ml)	¹¹ C Acetate, ¹¹ C Choline , ¹¹ C Methionine,
+ CTM (Carbon-11 Trapping Module)	¹¹ C Raclopride*



Add-on: For optimal performance of the ⁶⁸Ga synthesis add an Eckert & Ziegler ⁶⁸Ge/⁶⁸Ga Generator. Our GalliaPharm® is registered as a medicinal product in 17 European countries. A DMF Type II is filed in the United States and an MF Type I in Canada.

ystem Configuration	
asic system configuration + 68 Ge/68 Ga Generator	



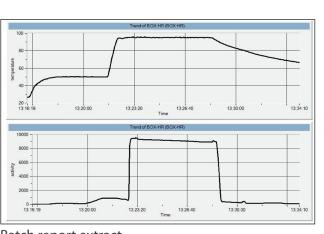
Highest quality standards

All consumables used are chemical resistant and have been tested for their suitability with the specific synthesis. Our products passed endotoxine and

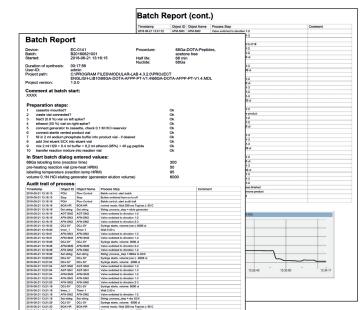
sterility tests and the residual solvents are within limits. For tracers listed in the European Pharmacopoeia the chemical purity is complying with the specifications.

Batch reports

- Automatically generated after each synthesis
- Contain relevant data regarding parameters such as: activity detector readings, flow rates, valve settings and more
- Saved in the database and retrievable as PDF at any time



Batch report extract



18**F**

Configuration

Add-on: An additional vacuum pump and an SLM-2 Module are needed for the production of ¹⁸F tracers. Due to the necessary rearrangement of modules the footprint of the system is smaller so that a different bottom plate and an additional distance module are required.

System Configuration	Tracers
Basic system configuration (without SLM-1) + vacuum pump + SLM-2	[¹⁸ F]FDG, [¹⁸ F]FES, [¹⁸ F]FET, [¹⁸ F]FLT, [¹⁸ F]FMISO, [¹⁸ F]NaF [*] , [¹⁸ F]PSMA-1007

*[¹⁸F]NaF - without SLM-4 & HRM



Choose according to your needs! Modular setup and open software option allow for routine production, research and development of new radiopharmaceuticals.

Once your setup is complete mount the cassette, add the chemicals and start the program!

Eckert & Ziegler offers guidance and assistance throughout the setup process and continuously keeps you updated on new developments.