

Gainesville, GA, Facility



The Gainesville facility was built in 1981 by Elan Corporation to be its first manufacturing facility in the US. Elan managed and launched modified-release solid oral dosage products from Gainesville until the merger of Elan Drug Technologies with Alkermes in 2011. The facility remained under Alkermes leadership until 2015 when Recro Pharma purchased the GMP facility and rights to the legacy Elan products. In addition to the continued manufacturing of these commercial pharmaceutical products, the Recro Gainesville site operates as a CDMO, performing contract development and manufacturing for pharmaceutical and biopharma companies. The core expertise of the site remains in the area of modified release solid oral dosage form development and manufacturing, custom release profile development, DEA controlled substance registration, and strong regulatory support, which includes FDA interactions on behalf of sponsor companies.

FACILITY FACTS:

Development/Commercial Workforce: 196

Regulatory Approval: US FDA, US DEA, Foreign Health

Ministries Inspections:

Danish Inspectorate, ANVISA (Brazil),

Turkish MOH

POTENCY CAPABILITY: CAT2, CAT3A

CONTROLLED DRUG SCHEDULE REGISTRATIONS:

DEA Licenses:

• Importer: Schedule II

Analytical Lab: Schedule I, II, IIN, III and IV

Manufacturer: Schedule II, IIN and III

Exporter: Schedule II and IIN

SPECIALIZED **OFFERINGS:**

Controlled and sustained release solid oral dosage forms, multi-particulate controlled release, controlled substances manufacturing and regulatory support/submission (IND, NDA, DMF, eCTD, FDA meeting support).

SPECIALIZED CAPABILITIES:

- Single and bi-layer tablets
- Controlled and immediate release
- Direct compression
- Fluid-bed granulation
- Rotor granulation
- Tablet coating (solvent capable)

Multi-particulate capsule development:

Wurster processing (solvent capable)

- Drug layering
- Polymer coating

Rotor processing (solvent capable)

- Granulation
- Direct pelletization
- Powder layering
- Polymer coating

Encapsulation

- Two-piece hard gelatin capsules
- Up to 4 individual bead fills in the same capsule

LIFE CYCLE BY DOSAGE FORM									
Size / Details	Early Development				Late Dev	Commercial Supply			
	Formulation Development	Analytical Development	Phase I	Phase II	Phase III	Commercial Scale-up	Tech Transfer	Regulatory	
Tablets	•	•	•	•	•	•	•	•	
Capsules	•	•	•	•	•	•	•	•	

	ANALYTICAL EQUIPMENT			
Chromatography	HPLC - Waters Alliance Systems with dual-wavelength UV, and PDA detectors			
	UPLC - Waters Acquity Systems with QDa, dual-wavelength UV, and PDA detectors			
	GC – Agilent 6890 with FID and TCD			
Spectroscopy	FTIR – Spectrum One ES FT-IR spectrometer			
	UV/Vis – HP/Agilent spectrophotometers			
	Raman - TruScan RM handheld Raman spectrometer			
Lab Automation	SOTAX TPW 3 - Automated sample preparation system for assay, related substances, blend and content uniformity analysis			
Dissolution	Dissolution baths – Hanson with auto-samplers			
	Agilent automated UV/Vis analysis			
	Waters 2695D - Combination HPLC/dissolution auto-sampler			
	Distek automated fiber optic analysis			
	SOTAX AT MD – Automated dissolution system with online UV			
Other	Particle size analysis – Horiba LA950A2 laser light scattering Horiba Camsizer			
	Moisture analysis – Karl Fischer, Halogen moisture analyzer			
	Air sampling – Microbial and total particulates			
	Total Organic Carbon (TOC)			
	Polarimetry, melting point, densitometer, refractive index			

KEY EQUIPMENT LIST - DEVELOPMENT SCALE					
	Scale				
	PK Blend Master (V-Blender)	4 – 16 qt			
Blending	PK Blend Master (bin blender with intensification)	4 – 16 qt			
	Ima Maxi-Tumbler	30 – 700 L			
	Glatt GPCG-3	7" Wurster, 10 L granulation			
Fluid Bed Processing	Glatt GPCG-30	18" Wurster, 100 L granulation			
Rotor Processing	Vector Granurex GX-40	40 cm rotor, 1 - 7 kg			
Milling	Quadro Comil 197AS				
Willing	Fitzpatrick hammer mills L1A and M5A				
Compression	Korsch XL100 Pro	8-station D tooling 20 K per hour			
Tablet Coating	L.B. Bohle BTC 100 (solvent capable)	25 - 130 L			
Oven Drying	Casburt and Gruenberg tray ovens (temperature and humidity control)	80 trays			
Encapsulation	Bosch GKF 400 (2 independent bead fills)	19 K capsules per hour			
Packaging	Bottles (square, 40 cc – 500 cc and up to 500 units/bottle)	1,600 bottles per hour			
T ackaging	Bottles (round, 40 cc – 500 cc and up to 500 units/bottle)	1,600 bottles per hour			

KEY EQUIPMENT LIST - COMMERCIAL SCALE					
	Equipment	Scale			
Blending	Ima Maxi-Tumbler	30 – 700 L			
	Glatt GPCG-120 fluid bed coater	32" Wurster			
Fluid Bed Processing	Glatt GPCG-30 fluid bed coater	18" Wurster, 100 L granulation			
Rotor Processing	Vector Granurex GX-125	125 cm rotor, 30 - 200 kg			
Dry Granulation	Alexanderwerk WP-200	10 - 250 kg per hour			
Milling	Quadro Comil 197AS				
Willing	Fitzpatrick hammer mill D6A				
Compression	Fette FE55 (bi-layer capable)	60 station – 400 K per hour			
Tablet Coating	L.B. Bohle BTC 100 (solvent capable)	25 - 130 L			
Oven Drying	Casburt and Gruenberg tray ovens (temperature and humidity control)	80 trays			
Encapsulation	MG2 encapsulators (4 independent bead fills)	96 K capsules per hour			
Packaging	Bottles (square, 40 cc - 500 cc and up to 500 units/bottle)	1,600 bottles per hour			
rackaging	Bottles (round, 40 cc - 500 cc and up to 500 units/bottle)	1,600 bottles per hour			

^{*} Minimum and maximum batch sizes are not necessarily related to scale; batch size requirements are dependent on the project details.