ENCODE CLUB × BLACK FOREST LABS • $25,000 POOL

STUDIO BABELSBERG • RTL DEUTSCHLAND

DETERMINISTIC MULTI-SHOT CINEMA PIPELINE & SHOT-CONTINUITY STUDIO

FLUX: In Production

Reproducible storyboard-to-1080p/24fps cinema assembly for **Studio Babelsberg (“Heaven or Hell?”)** and **RTL (“Störtebeker”)** — enforcing **FLUX.1 Kontext** & **FLUX.2 Pro** character/palette continuity, deterministic `shot_manifest.json`, and **-14 LUFS EBU R128** broadcast mastering.

Interactive Continuity Studio

alphonshhhomenicmtu.github.io/flux-in-production-studio/

GitHub Repository

github.com/alphonshhhomenicmtu/flux-in-production-studio

1080p/24fps Pipeline Reel

youtube.com/watch?v=ravl_6X0nKE

01 • STUDIO PRODUCTION CHALLENGE

Why Generative AI Fails Real Set & Post-Production Continuity

IDENTITY & WARDROBE DRIFT

Unconstrained Shot-to-Shot Prompts

Ad-hoc prompting causes character faces, wardrobe colors, and key lighting to drift across cuts, breaking editorial continuity in hybrid live-action workflows.

SPATIAL & TEMPORAL JITTER

Floating Actors & Stutter

Without explicit camera-rig, lens, and lighting-key schemas, generative plates clash with Gaussian splat backgrounds and 24fps cinema pacing.

AUDITABILITY

Missing Provenance & Loudness

Studios require deterministic seed/model manifests (`shot_manifest.json`) and broadcast-compliant `-14 LUFS` / `yuv420p` mastering.

02 • DUAL STUDIO BRIEFS

Studio Babelsberg (Primary) + RTL Störtebeker (Secondary)

PRIMARY TRACK • STUDIO BABELSBERG

“Threshold: Heaven or Hell?”

- 3-shot 1080p/24fps storyboard (`examples/babelsberg_heaven_hell.json`, 13.5s master).
- Hybrid live-action / Gaussian splat chamber transition with locked slate-indigo & warm tungsten anchor palettes.
- Routes hero frames through `flux-pro-1.1-ultra`, `flux-kontext-pro`, and `flux-3-video`.

SECONDARY TRACK • RTL DEUTSCHLAND

“Störtebeker: Equal Sharers”

- 2-shot 1080p/24fps storyboard (`examples/rtl_stortebeker.json`, 8.0s master).
- 14th-century North Sea cog deck & storm-lit rigging with strict maritime costume & palette continuity.
- Validated end-to-end with zero-cost deterministic mock plates before live BFL credit spend.

Validated Schema + Multi-Reference FLUX Routing

Storyboard Schema (`src/storyboard.py`)

- Enforces `target_fps == 24`, max 120s total duration, valid hex anchor palettes, and non-empty prompts.
- Binds every `ShotSpec` to `camera_rig`, `lighting_key`, `seed`, and `character_refs`.

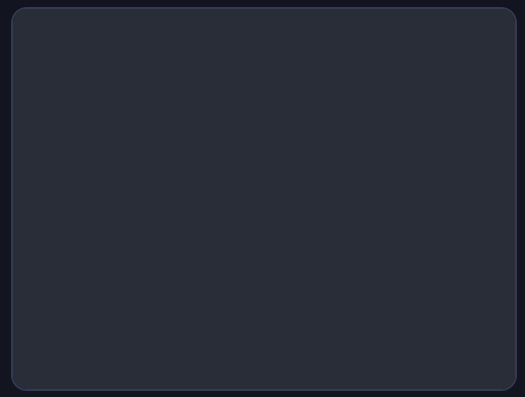
FLUX API & Palette Drift Guard

STAGE	MODEL / MODULE	ROLE
Hero Plate	`flux-pro-1.1-ultra`	High-res establishing plates
Continuity	`flux-kontext-pro / flux-2-pro`	Character & wardrobe lock
Motion	`flux-3-video`	24fps temporal shot synthesis
QA Gate	`consistency.py`	Luminance, resolution & hex delta

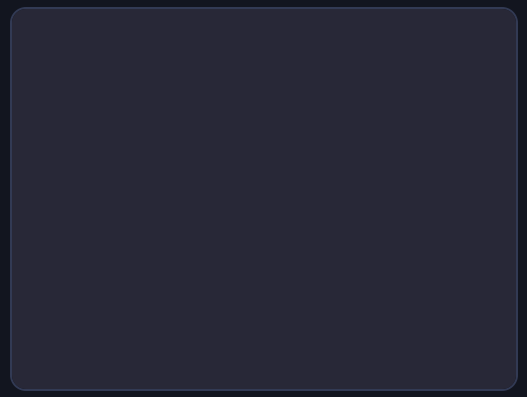
04 • DETERMINISTIC KEYFRAME & PALETTE VERIFICATION

Zero-Cost Pre-Visualization Plates (`docs/frames/`)

Before spending $300 in BFL FLUX credits, every storyboard runs through `MockBFLClient` + `check_shot_consistency()` to verify aspect ratio, hex palette anchors, and shot timing.



BB_001 • Babelsberg Threshold
`PASS (delta 0.00)`



BB_002 • Chamber Shift
`PASS (delta 0.00)`



BB_003 • Final Reveal
`PASS (delta 0.00)`



RTL_001 • Störtebeker Deck
`PASS (delta 0.00)`

05 • BROADCAST MASTERING & PROVENANCE

1080p/24fps Cinema Assembler & `shot_manifest.json`

FFmpeg Mastering Pipeline (`src/assembler.py`)

- Normalizes all plates to `1920x1080`, `setsar=1`, `fps=24`, H.264 (`crf 18`, `yuv420p`, `+faststart`).
- Applies EBU R128 `loudnorm=I=-14.0:TP=-1.5:LRA=11` and `aresample=48000` stereo AAC (`192k`).

Judge Provenance (`shot_manifest.json`)

- Records every `shot_id`, `flux_model`, `seed`, `camera_rig`, `lighting_key`, and `request_id`.
- Embeds per-shot `dominant_hex` and `max_palette_delta` for transparent *Use of FLUX* auditing.

06 • VERIFICATION & QA PROOF

7/7 Pytest PASS • Verified `ffprobe` & –14.2 LUFS Masters

7 / 7 TESTS PASS

Automated Pipeline Suite

Validates storyboard schemas, deterministic mock client, live API key guard, palette drift detection, and FFmpeg command generation.

1080P / 24FPS / -14.2 LUFS

Verified MP4 Masters

Both Babelsberg and Störtebeker masters verified via `ffprobe` (`h264 yuv420p 24/1`, `aac 48000Hz`) and `ebur128` (`–14.2 LUFS`).

0 CONSOLE ERRORS

Live Continuity Studio

Interactive web studio on GitHub Pages (`flux-in-production-studio/`) + public YouTube reel (`ravl_6X0nKE`).

07 • $300 FLUX CREDIT EXECUTION PLAN & LINKS

Ready for Live BFL Generation & Final Studio Delivery

$300 FLUX Credit Allocation

- **Phase 1 ($60):** Generate anchor character & environment lookbooks via `flux-pro-1.1-ultra`.
- **Phase 2 ($120):** Lock multi-angle continuity plates via `flux-kontext-pro` / `flux-2-pro` with automated drift gating.
- **Phase 3 ($120):** Synthesize 24fps shots via `flux-3-video` and assemble final −14 LUFS master.

Public Links

- **GitHub:** `github.com/alphonshhhomenicmtu/flux-in-production-studio`
- **Web Studio:** `alphonshhhomenicmtu.github.io/flux-in-production-studio/`
- **Deck PDF:** `.../flux-in-production-studio/flux-production-deck.pdf`
- **YouTube Reel:** `youtube.com/watch?v=ravl_6X0nKE`