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Starlight Drift — Project Overview (Confidential)

Starlight Drift should produce a wide range of high-quality, musically intentional spatial effects that move fluidly from subtle enhancement to expansive, ethereal soundscapes. At shorter settings, it should function as a refined space tool—placing a sound convincingly into a room, adding depth, or giving a source a controlled halo of ambience without obscuring clarity. As the time and drift increase, it should evolve into a more cinematic processor, generating thought-provoking, outer-space-like textures with gentle motion, harmonic shimmer, and a sense of scale suitable for ambient music, modern production, and sound design for picture. Across all settings, the sound should feel polished with the ability to get experimental, with an emphasis on immediacy—allowing users to arrive at an interesting, usable result quickly, without too much technical setup or parameter hunting, unless they felt like it.

1) Product definition

Core sound

- Input → **Granular Delay** (grain-based time smear / pitch scatter) → **Shimmer Reverb** (reverb + pitched feedback path) → Output
- A **Freeze/Hold** mode that captures the current texture (either at the granular buffer, the reverb input, or reverb tail)

What makes it “grain shimmer”

- The delay doesn’t just repeat; it emits **grains** from a delay buffer with:
    - variable grain size, density, jitter, pitch, and stereo spread
- The reverb includes a **pitch-shifted feedback path** (classic shimmer topology) but is fed by the granular texture, so it becomes “sparkly” without sounding like a standard pitch-reverb.

Most shimmer / granular ambience plugins already provide:

- Pitch-shifted feedback paths
- Grain size and density controls
- Diffusion + reverb tails

- Freeze and hold functions
- Stereo widening and modulation

Examples in this space include Valhalla DSP, Eventide, Soundtoys, and Output, although what I am basing my vision on is something that sounds more in-line with Mondo Loops Dust Verb and Star Tilde Nebula.

To compete, Starlight Drift must:

- Reduce decision fatigue
- Offer musically guided behavior
- Enable results faster than peers
- Sound intentional, not random

2) MVP feature set (Version 0.1)

Signal flow (fixed)

1. **Input Gain**
2. **Granular Delay**
3. **Shimmer Reverb**
4. **Mix (Wet/Dry) + Output Gain**

Granular Delay controls

- **Delay Time** (ms) + **Sync** (optional later)
- **Feedback** (0–95%)
- **Grain Size** (10–250 ms)
- **Density** (grains/sec)
- **Jitter** (randomize read position)
- **Pitch** (semitones, e.g. -12 to +12)
- **Spread** (stereo offset/random)

Shimmer Reverb controls

- **Reverb Size**
- **Damping / Tone**
- **Shimmer Amount** (how much pitched path is mixed into the reverb feedback)
- **Shimmer Pitch** (e.g. +12, +7, +5, +24)
- **Pre-Delay**
- **Reverb Mix** (internal wet of reverb stage if needed)

Global

- **Freeze** (captures and holds texture)
- **Mod Rate / Mod Depth** (light modulation for time/pitch drift)
- **Individual Paramater Lock** (ability to lock any parameter from change by anything other than automation
- **Shift-click after parameter change** (reverts that setting to its previous state for quicker and easier A/B of single parameter adjustment)
- **Output Limiter** (simple safety)

3) Suggested knob set (visible by default)

Grains: Time, Feedback, Size, Density, Jitter, Pitch, Spread
Reverb: Size, PreDelay, Tone, Shimmer Amount, ShimmerPitch, ReverbMix
Global: Mix, Individually bypass-able High/Low-pass filters on effect output only, ModDepth, ModRate, Freeze, Output

* **Shimmer**

Amount of pitch-shifted signal fed into the reverb.

- Internally locked to musically safe intervals
- No user pitch selection in v1

Reason: Avoid metallic artifacts and choice overload.

Two “macro” knobs (high perceived value)

- **AIR**: gently opens tone + raises shimmer path + increases grain density
- **GLASS**: increases pitch amount + shortens grain size + adds stereo spread

These are just internal mappings to multiple parameters. User should be able to adjust the single macro, changing multiple controls at once, but further adjustment of a single parameter should be allowed.

4) Drift as a First-Class Musical Parameter

Instead of treating grain motion, pitch modulation, and time smear as separate knobs:

Introduce a single global macro called “Drift” that:

- Gradually offsets grain start positions
- Introduces micro-detuning over time (non-LFO-based)
- Slowly destabilizes rhythmic alignment
- Evolves stereo phase relationships

Why this stands out

- Feels *alive* without sounding chaotic
- Engineers can dial “motion” instead of engineering it
- Composers get evolving soundbeds with one control

Competing plugins expose parameters.
Starlight Drift exposes *behavior*.

Perceptual Control, Not Technical Control

This is my initial vision and my thoughts and ideas on how this should ultimately be could change. I doubt drastically - this plugin should have some standard and some unique features, but absolutely not be overly complicated for the user.

I appreciate you taking the time to review this writeup on Dynachord Play. In your own time, and if you feel this project would be a good fit, I would welcome your cost so I could set that up on Fivrr, your initial thoughts on feasibility, an estimated timeframe, and any high-level observations you may have about the project overall.

This discussion is intended to be exploratory and informational, and I am primarily interested in understanding how you would approach a project of this nature and whether there is a potential fit going forward.

Kind regards,

Peter Larkin