

sleep better on release day



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*"The code was working **on my machine.**"*

What actually **matters**

Unit

Integration

E2E

Smoke

Regression

Cross-browser

**Visual
regression**

Accessibility

Compatibility

**Manual
exploratory**

Performance

This is where release confidence lives.

I'm **just** the messenger



Andrew Herron
Staff Software Engineer



Shiridi Gandham
Senior Software Engineering Manager

The **three** pillars

1

**Integration
Matrix**

2

**Timeline
Strategy**

3

**AI Models
Interoperability**

The **four** pillars

1

**Integration
Matrix**

2

**Timeline
Strategy**

3

**AI Models
Interoperability**

4 Manual

the scope

1

TinyMCE Core

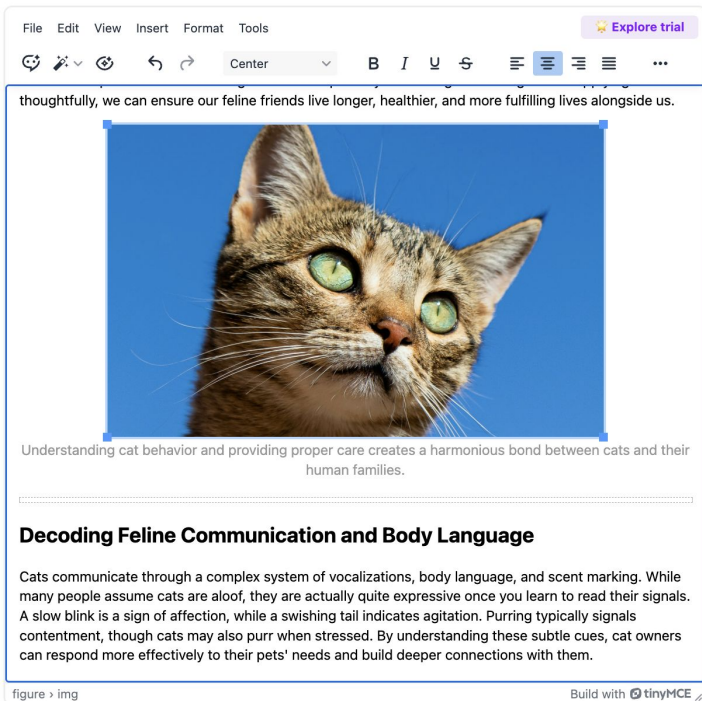
29

OSS plugins

35

premium plugins


Two renderers, one truth



File Edit View Insert Format Tools Explore trial

Center B I U

thoughtfully, we can ensure our feline friends live longer, healthier, and more fulfilling lives alongside us.



Understanding cat behavior and providing proper care creates a harmonious bond between cats and their human families.

Decoding Feline Communication and Body Language

Cats communicate through a complex system of vocalizations, body language, and scent marking. While many people assume cats are aloof, they are actually quite expressive once you learn to read their signals. A slow blink is a sign of affection, while a swishing tail indicates agitation. Purring typically signals contentment, though cats may also purr when stressed. By understanding these subtle cues, cat owners can respond more effectively to their pets' needs and build deeper connections with them.

figure > img Build with tinyMCE



Understanding cat behavior and providing proper care creates a harmonious bond between cats and their human families.

For evaluation purposes only. Created with TinyMCE [Export to PDF](#) plugin.

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28

shared libraries

16

supported frameworks

Supported frameworks

Angular

React

Vue

Svelte

Web Components

jQuery

Ruby on Rails

Django

Laravel

.NET

Blazor

Bootstrap

Node.js

+ more

17k+

automated tests

Pillar 1: integration matrix

The matrix

Bundlers (CI)

Rollup + rspack

Browsers

Chrome (Win + macOS) + Firefox (Win + macOS) + Safari (macOS) + Edge (Win)

OS

Windows latest + macOS Sequoia + (Linux for Node unit tests)

Three tiers of tests



atomic

Node + jsdom

fastest, no browser



browser

Headless Chrome

real DOM, real rendering



webdriver

Selenium + BrowserStack

cross-browser, real OS

Bedrock: Test Harness

Suite progress: 10810/10810



Test run completed in 5.5002s

What we **don't** test

Other bundlers

Webpack · Vite · esbuild · Parcel

Real LLM providers

No live OpenAI, Anthropic, etc.

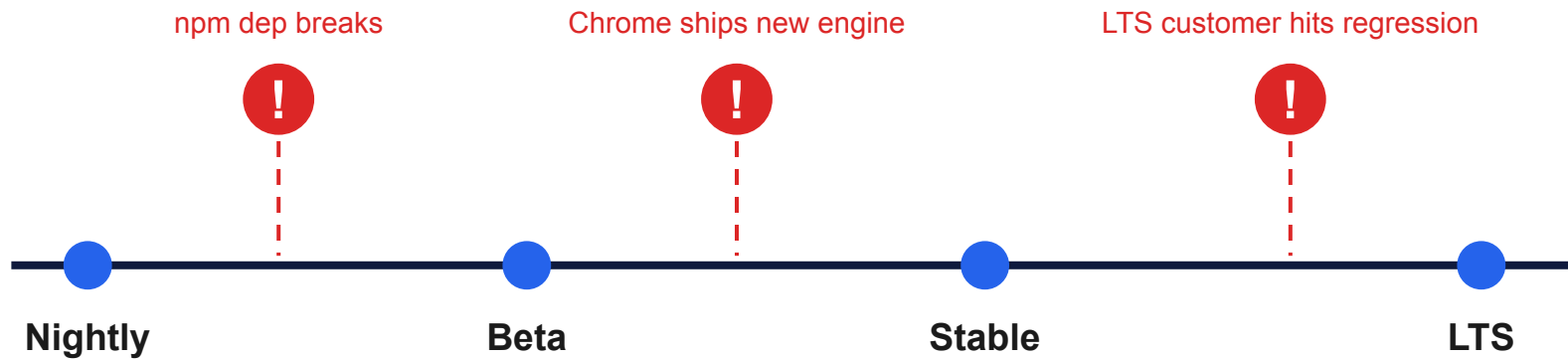
AI text content

Wording of model responses

*"Pretending you have 100% coverage is
a lie that **bites** you later."*

Pillar 2: timeline strategy

You **don't** control the timeline



Chasing the browser

Chrome 146 (Before)





```
border-right-style: none
```

Chrome 147 (After)

```
border-right: medium none  
currentcolor
```

Pasting content from Office with PowerPaste: same rendering, but different CSS.

The **coverage** ladder

	PR build	Affected modules only on 3-browser subset
	Main build	All modules with the full browser matrix
	Nightly	Latest main, published to cloud
	Release pipeline	Publishes RC to production

The **nightly** cadence

17:00 UTC

Community nightly

OSS TinyMCE → public artifact

18:00 UTC

RC nightly

Premium → cloud dev channel

Alert on transitions

#tinymce-build-status

Fires when main or release branches transition pass ↔ fail

#tinymce-releases

Release progress: started, RC built, published, etc.

The path from "done" to "in customer hands"

Exploratory phase

5 phases on TestRail

issues filed in Jira

Code freeze

no new features

candidate branch cut

RC build

premium → cloud testing

QA exercises on real build

Sign-off + release

QA Mgr + Product Mgr

publish to production

Gate the release

Content

No loss or corruption

Bugs

No P1 issues open

Editor

Stays operational

Docs

Updated for release

Sign-off

QA + Product Manager

Pillar 3: **AI models** **interoperability**

How do you **test** a maybe?

Deterministic code

```
input A → output B  
assert(output === B)
```

Same input → same output

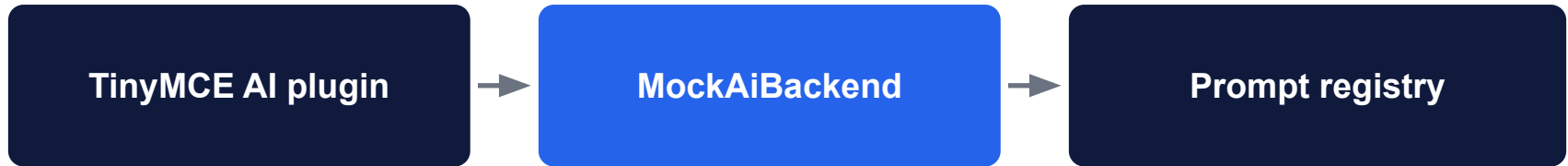
Non-deterministic AI

```
input A → B, C, or D  
assert(intent === "B")
```

Same input → different output

Don't test the LLM.

Test everything around it.



No network. No tokens. No flakes.

How do you **test** a maybe?

Deterministic code

```
input A → output B  
assert(output === B)
```

Same input → same output

Non-deterministic AI

```
input A → B, C, or D  
assert(intent === "B")
```

Same input → different output

Force the edge cases

delay-5000

Pause 5 seconds before responding (test slow paths)

error-foo

Return a specific error envelope (test error handling)

What about **production**?

1

Real session breaks

Customer reports a bug.

2

/dump exports state

Every HTTP request, every SSE message, every error.

3

JSON becomes fixture

Becomes the source for a new mock fixture

What this strategy **doesn't** catch

- ! Real provider regressions
- ! Content quality (whether the AI's output is actually useful)
- ! Token cost behavior under load

Pillar Foundation: manual

*"100% automation is a **lie**."*

What automation still misses

- Visual glitches in skins & icon packs
- Mobile touch, on-screen keyboards, gestures
- Accessibility: screen-reader behavior, focus traps
- UX & copy: confusing tooltips, awkward labels
- Undo/redo state-history bugs
- Copy/paste & drag-drop fidelity
- Console errors that don't break anything

What humans **see** that code can't

Print plugin didn't open print window on Firefox

Headless automation didn't catch it: headless has no print dialog.

Humans, on real machines, found it instantly.

in the end

Sleep better on release day



Matrix



Timeline



AI



Manual





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