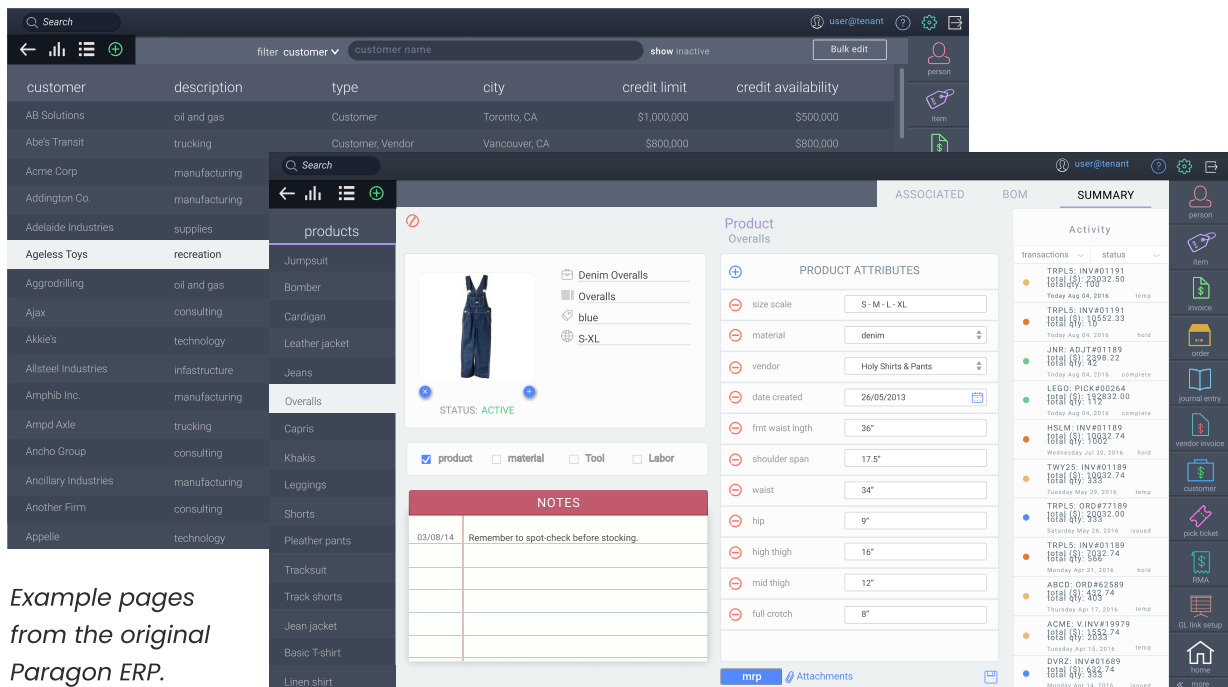


Paragon Mobile

Creating a mobile app suitable for a wide variety of users from a massive, feature-rich Enterprise Resource Planning (ERP) system.

Main Challenges

- Many different types of users to handle, all with divergent needs (warehouse employees, salespeople, managers, etc).
- Working with a large, complex, and information-dense piece of software.
- Very limited user data and no option to collect more.
- Extremely tight deadline for clickable prototype to demonstrate product to investors.



1 ERPs are immense because they handle almost every aspect of a company's operations.

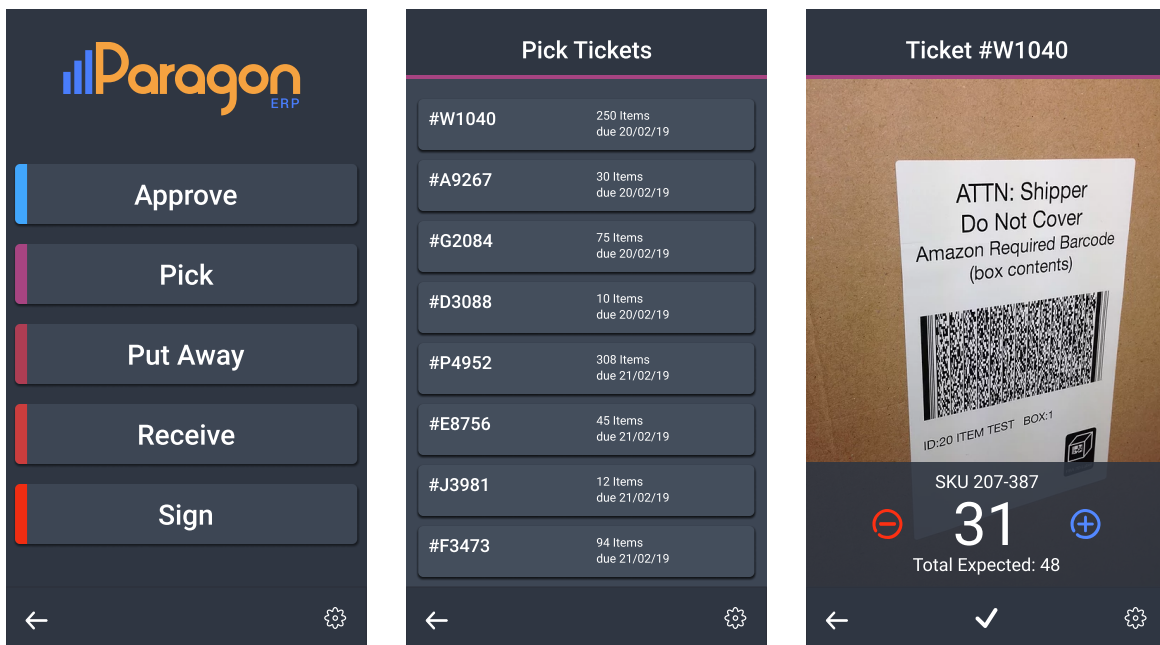
2 But an employee attempting to complete a specific task doesn't need *all* the information available in the system, just the useful stuff.

Approach

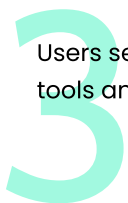
- Conducted stakeholder interviews with CEO, team leads, and team members with expertise either in the technology or the clients (developers, business development, services).
- Examined available user data (a client's detailed description of their warehouse workflow).
- Created a list of product requirements.

Key Product Decisions

- Instead of a "mobile version" of the software, I decided to create a complimentary task-based app.
- Maintained consistency of style through use of same fonts and colours as original software.



Screens from the app illustrating the "pick" workflow.



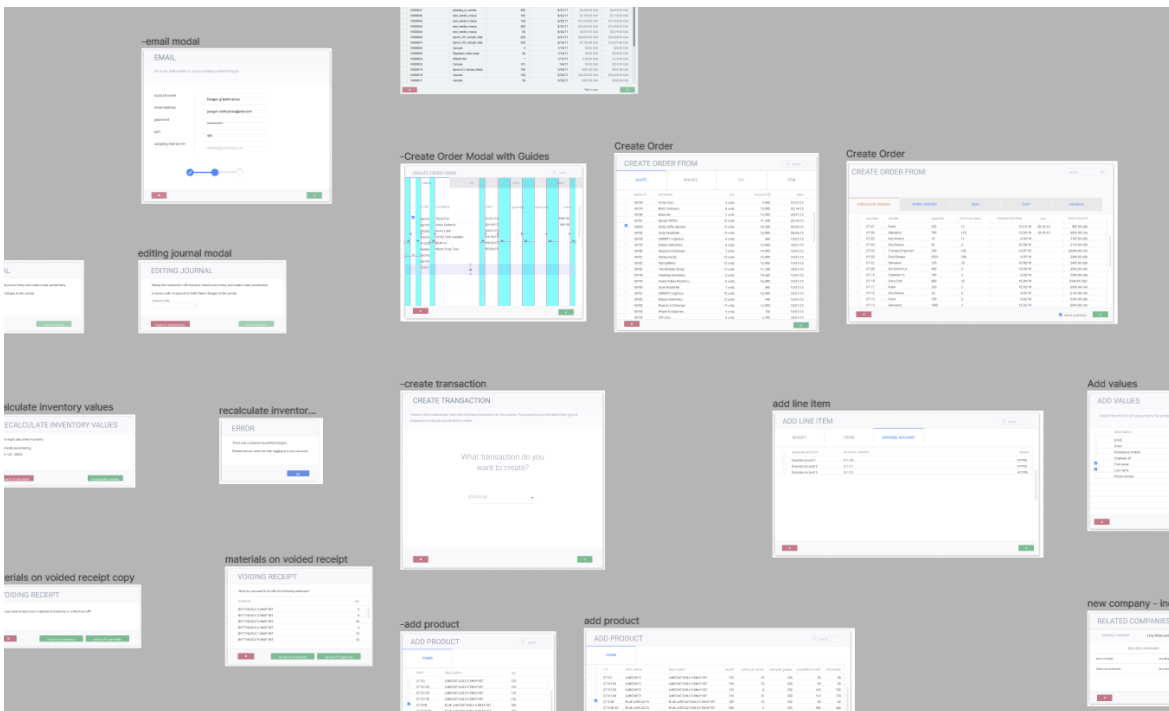
Users select a task and are provided with the tools and information they need to complete it.

Paragon Component Library

Creating a single, consistent source for all Paragon ERP components and assets that would be easily shared by our growing team.

Main Challenges

- Components were scattered among Sketch documents, made by three different designers (none of whom remained at the company), with no consistent naming or organizational scheme.
- No style guide meant inconsistencies in existing assets as well as no framework for creating new ones.
- Discrepancies between designs made it difficult to determine correct versions.



The modals file.

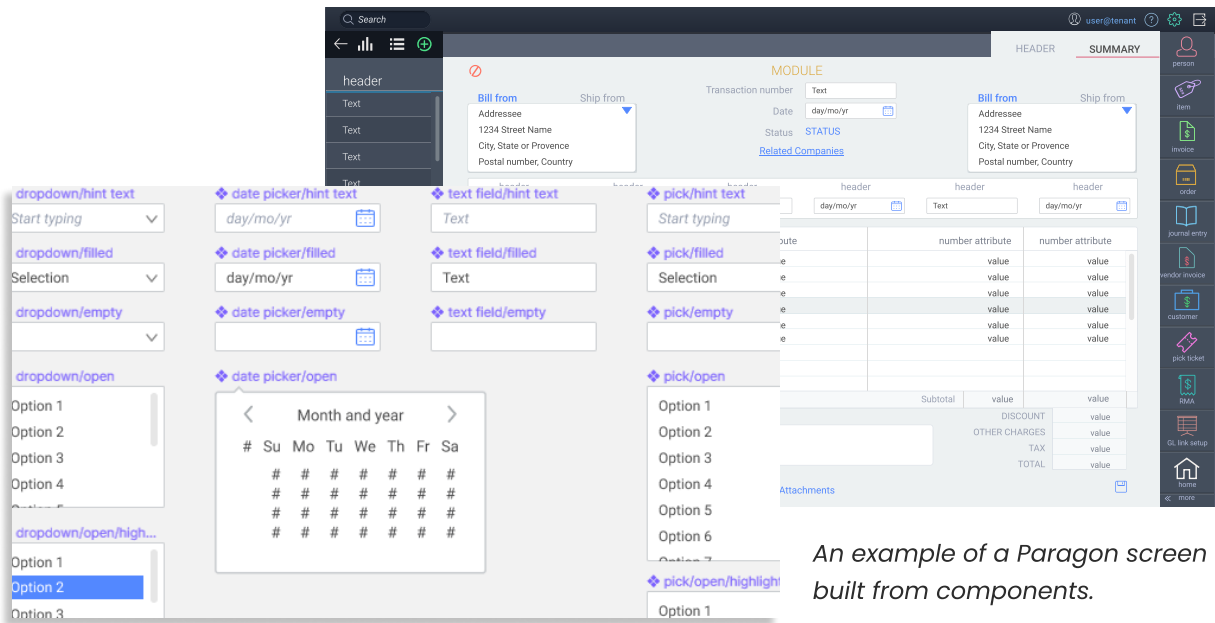
1 For example, there was a massive file called “modals”, a random heap of most (but not all) modal-based designs.

Approach

- Reviewed design software and asset organizational schemes to choose best combination for easy sharing between teams, version tracking, and ensuring teams had a single source of truth.
- Audited existing files and compared designs to Paragon and open issues, compiled a list of relevant assets that were in-use or waiting on
- implementation. Created archive of outdated designs.

Key Product Decisions

- Chose Figma to replace Sketch and Invision due to lower cost, integrated prototyping, superior hand-off experience, and excellent capacity for sharing files among our growing team.
- Imported Sketch files to Figma, created component library, and rebuilt designs with components.



An example of a Paragon screen built from components.

Assets in the new component library.

2 New assets were built from the component library to ensure consistency, and so that purposeful changes would be automatically reflected in all designs.

Rules and Workflows

Allowing Paragon ERP users to modify its behaviour to suit their specific business needs by creating “rules” using a natural language wizard.

Main Challenges

- Developing a natural language alternative to programming that is intuitive and not intimidating.
- Allowing for the potential complexity of rules while maintaining simplicity in the design.
- Allowing rules to be arranged into “workflows”: strings of automated actions with conditional logic.
- No user data and no option to collect any.

```
/* ... */  
  
// the setup function runs once when you press reset or power the board  
void setup() {  
  Serial.  
}  
  
// the loop  
void loop() {  
  available  
}  
}
```

An example of the software I ranked as part of my competitive analysis.

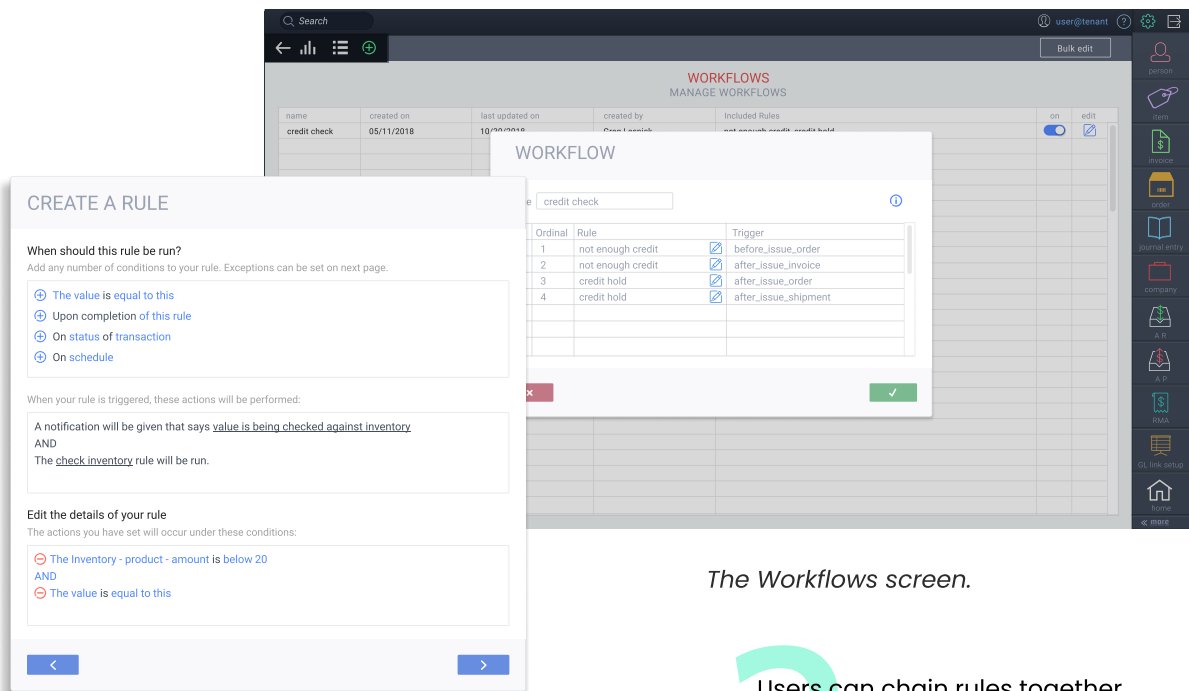
1 We tried to move away from interfaces like this, but it was difficult to find a solution that allowed for as much complexity without the high learning curve.

Approach

- Conducted stakeholder interviews with CEO, team leads, and team members with expertise either in the technology or the clients (developers, business development, services).
- Completed competitive analysis of software with similar functionality, ranked their solutions according to findability, ease-of-use, and aesthetic.

Key Product Decisions

- Using work from my predecessor as a base, I went with a clean design that sacrificed some capacity for very complex rules for a wizard that presented a series of short lists of options from which users could create basic rules. More complex rules could still be added by developers.



The Rule Wizard modal.

The Workflows screen.

Users can chain rules together into “workflows” and automate the most tedious parts of their work.

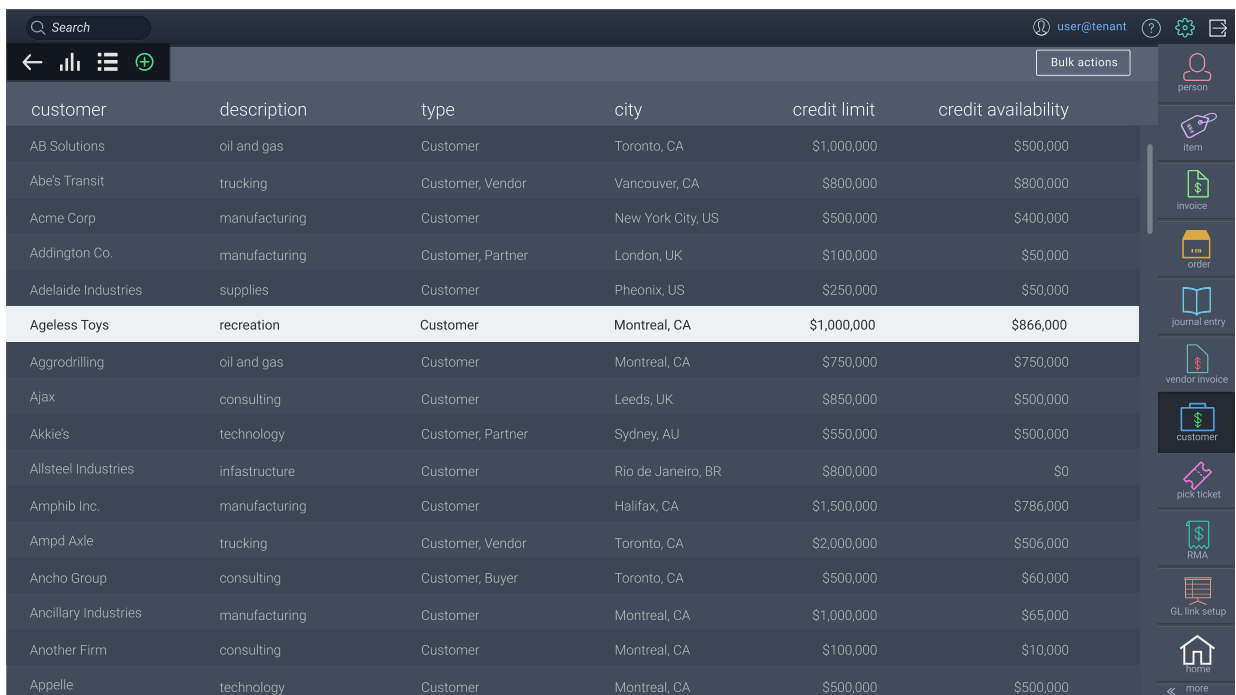
The interface is clean and approachable. Users can check their rules in plain language and in code before putting them into action and can edit them any time.

Filter and Bulk Actions

Allowing Paragon ERP users to locate and make changes to multiple references at once.

Main Challenges

- Users needed the capacity to filter accurately and quickly by category or multiple categories.
- Needed to incorporate new functionality without compromising white space.
- Technological constraints meant that we couldn't combine this functionality with the existing search.
- No user data and no option to collect any.



customer	description	type	city	credit limit	credit availability
AB Solutions	oil and gas	Customer	Toronto, CA	\$1,000,000	\$500,000
Abe's Transit	trucking	Customer, Vendor	Vancouver, CA	\$800,000	\$800,000
Acme Corp	manufacturing	Customer	New York City, US	\$500,000	\$400,000
Addington Co.	manufacturing	Customer, Partner	London, UK	\$100,000	\$50,000
Adelaide Industries	supplies	Customer	Pheonix, US	\$250,000	\$50,000
Ageless Toys	recreation	Customer	Montreal, CA	\$1,000,000	\$866,000
Aggrodriilling	oil and gas	Customer	Montreal, CA	\$750,000	\$750,000
Ajax	consulting	Customer	Leeds, UK	\$850,000	\$500,000
Akkie's	technology	Customer, Partner	Sydney, AU	\$550,000	\$500,000
Allsteel Industries	infrastructure	Customer	Rio de Janeiro, BR	\$800,000	\$0
Amphib Inc.	manufacturing	Customer	Halifax, CA	\$1,500,000	\$786,000
Ampd Axle	trucking	Customer, Vendor	Toronto, CA	\$2,000,000	\$506,000
Ancho Group	consulting	Customer, Buyer	Toronto, CA	\$500,000	\$60,000
Ancillary Industries	manufacturing	Customer	Montreal, CA	\$1,000,000	\$65,000
Another Firm	consulting	Customer	Montreal, CA	\$100,000	\$10,000
Appelle	technology	Customer	Montreal, CA	\$500,000	\$500,000

Paragon ERP's customer list screen before the new functionality was added.

1 I didn't have a lot of white space to work with, but the filter function was going to be used too frequently to hide it away.

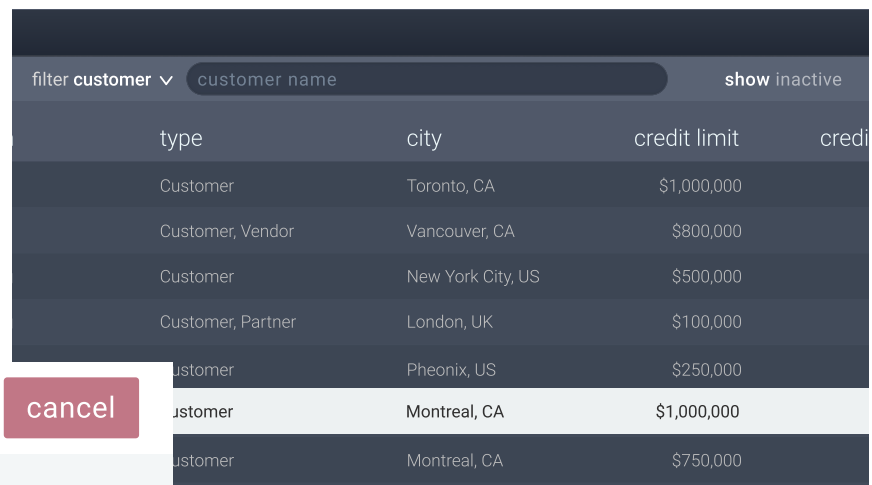
Approach

- Conducted stakeholder interviews with CEO, team leads, and team members with expertise either in the technology or the clients (developers, business development, services).
- Completed competitive analysis of software and websites with similar functionality, ranked their solutions according to findability, ease-of-use, and aesthetic.

Key Product Decisions

- This functionality would be seeing heavy use, so it needed to be readily accessible at all times, on all list pages. In light of this, I added it centrally to the top bar, and rejected other options such as hiding it in an “advanced search” dropdown or menu.

2 To combat the loss of white space, I made the new functionality unobtrusive by using a darker grey for the filter bar.



filter customer ▾	customer name	show inactive	
type	city	credit limit	credi
Customer	Toronto, CA	\$1,000,000	
Customer, Vendor	Vancouver, CA	\$800,000	
Customer	New York City, US	\$500,000	
Customer, Partner	London, UK	\$100,000	
Customer	Pheonix, US	\$250,000	
Customer	Montreal, CA	\$1,000,000	
Customer	Montreal, CA	\$750,000	

Bulk actions

activate

deactivate

edit

delete

cancel

Paragon ERP's customer list page with new functionality.

3 The ability to filter precisely, in tandem with the bulk actions, made for a powerful new tool and a massive upgrade in UX.

Paragon ERP's bulk actions menu.