

# Ask A Researcher: Transforming Research to Practice

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## Introduction


Growing advancements in computer science have created a digital divide between researchers and practitioners in the industry. This divide creates difficulty for individuals seeking to apply the latest research findings and for researchers to address real-world problems. To bridge this gap, we present “Ask A Researcher,” an engaging platform designed to connect and facilitate collaboration between practitioners and researchers. This centralized hub of knowledge-sharing fosters an environment which provides benefit to both academia and industry.

### Motivation:

- Bridging the gap
- Enhancing collaboration
- Accelerating innovation
- Mutual Benefit
- Educational Resource

 Software engineering research vs. practical application gap

 Q/A websites – generalized purpose, technical problems

 Researchers – unclear idea about industry

 Practitioners- unclear latest useful tools developed by researchers

 Need for structured platform for academia-industry exchange

## Methods

- Developed iteratively by the research team
- Collaborative decision-making based on project goals
- Brainstormed Features
- Addressed challenges like user adoption
- Refinement based on ongoing feedback.
- Initial user study involved 6 participants

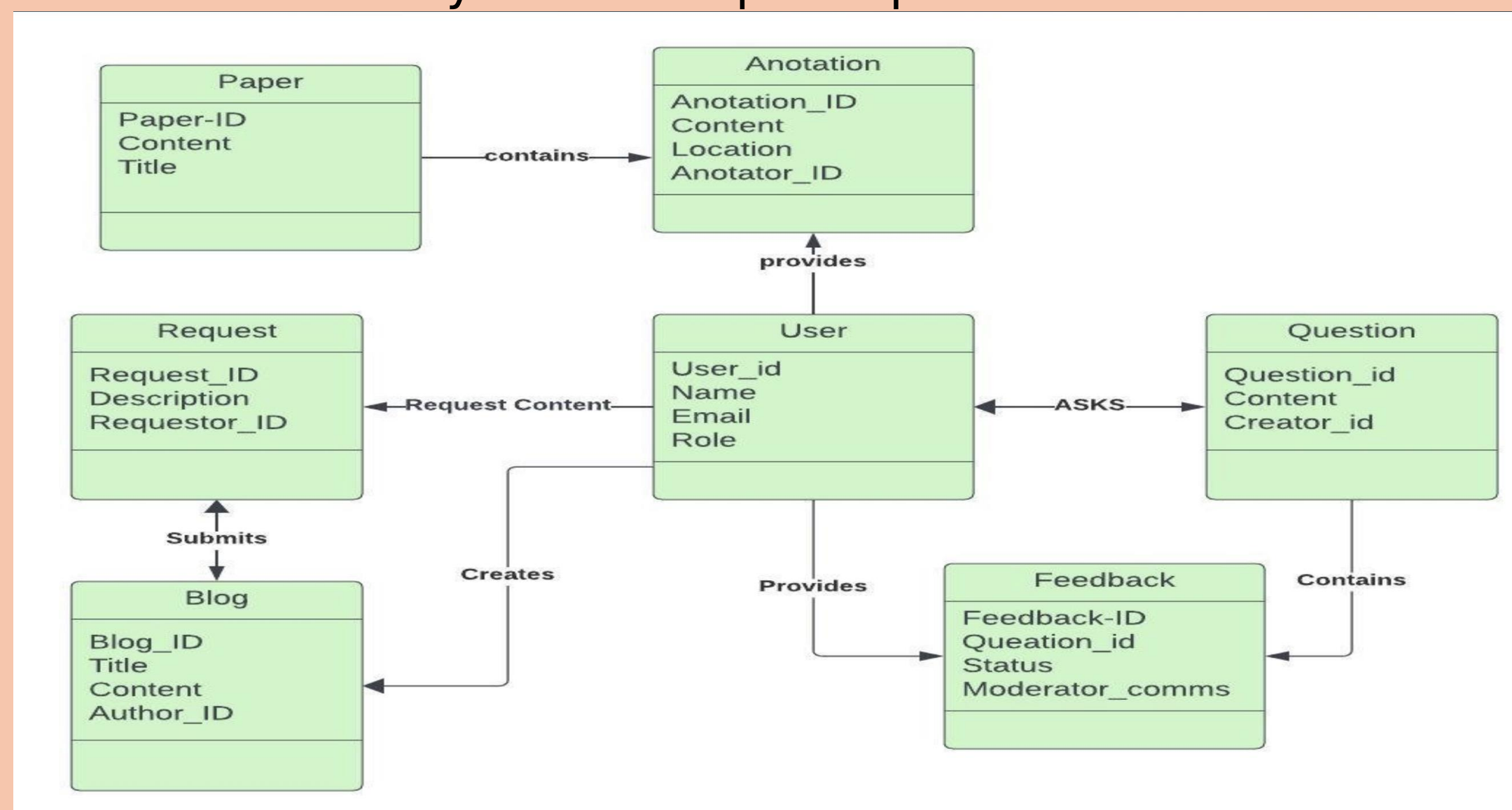


Figure 1: System Overview

## Results

### Basic Functionalities

#### Q/A Platform:

- Enables users to share questions and expertise
- Each question is tagged for organization
- Facilitates vibrant discussions and collaborative problem-solving

Write A Blog

Title

Blog article:

Tags (comma-separated)

Images URLs (comma-separated)

Submit Blog

Figure 3: Expert Blogs

#### User Study Feedback:

- 2 in person, 4 online
- Overall platform
- Feedback provide feature
- Content Request feature
- Annotation Feature

#### Feedback System:

- Implemented to ensure content quality and relevance
- Users can provide feedback on questions and answers
- Enables endorsement of high-quality contributions and flagging of unclear content
- Separate rating systems guide users to reliable information

Post A Question

Title:

Question:

Select your role:

Tags:

Add tags to help categorize your question.

Post Your Question

Figure 2: Post a Question

#### Expert Blogs:

- Allows industry experts and researchers to share knowledge
- Users can read, comment, and reference blogs for deeper understanding
- Blog posts complement Q/A section, enhancing knowledge sharing
- Encourages experts to contribute valuable insights and perspectives

Recent Questions

How to improve frontend performance?

Looking for suggestions on improving the performance of a web app from

Tags: frontend

Try lazy loading

Best practices

How can I secure my

Tags: api

Use HTTPS and

Feedback Form

User Name

Activity

Feedback Description

Write your feedback

Send feedback to the user email as well

Send Feedback to the user

### Advanced Functionalities

#### Request Content:

- Unique feature enabling users to solicit specific content from experts
- Addresses individualized needs and provides tailored content
- Enhances user experience by offering personalized responses
- Enables direct engagement with knowledgeable individuals within the community

Request Content from tester01

Title

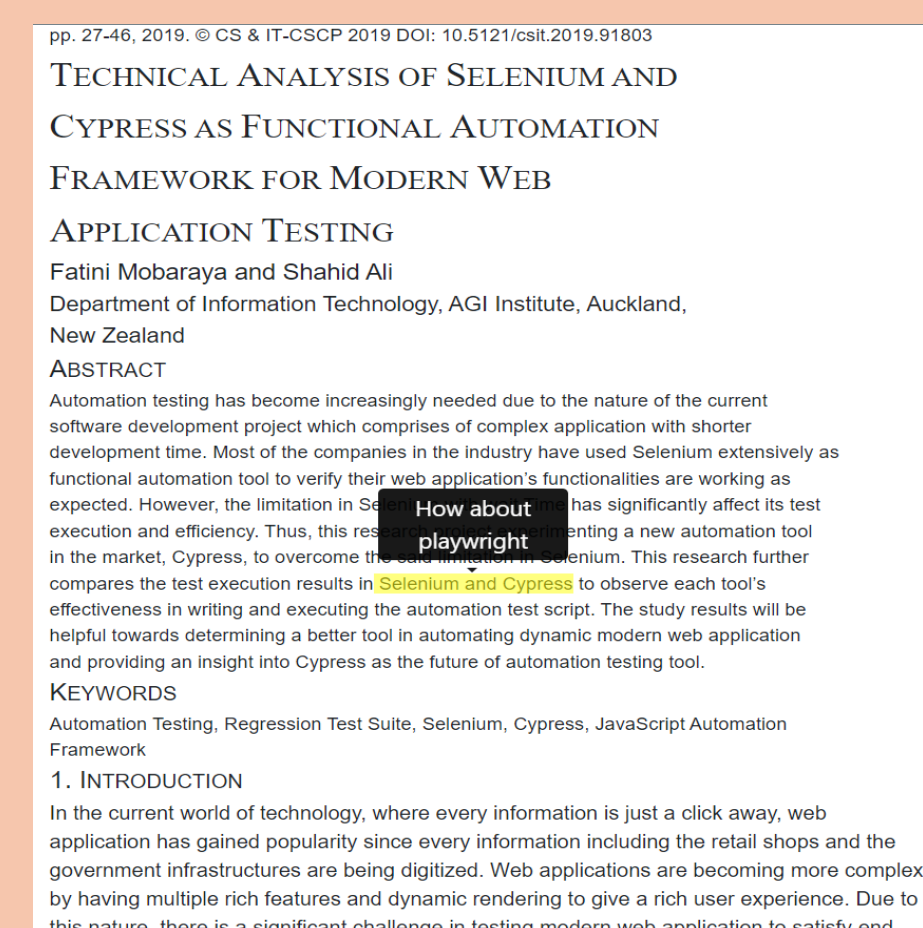
Description

Area

Expected Completion Date

Submit Request

Figure 5: Request Content



Figures 6 & 7: Paper Annotation

## Conclusion

- **Communication System:** Bridges the gap between software researchers and practitioners.
- **Innovative Platform:** Includes Q/A section, blogs, feedback mechanisms, and content requests.
- **Direct Interactions:** Creates meaningful connections.
- **Knowledge Exchange:** Facilitates expert knowledge exchange.
- **Real-Time Exchange:** Shares real-time industry challenges and research insights.

## Future Work

- **AI Integration:** Enhances interactions and user-specific experiences.
- **Deeper Engagement:** Fosters meaningful engagement and knowledge transfer in the software engineering community.

## Acknowledgements

I would like to express my sincere gratitude to all members of my lab for their invaluable contributions to this research: Dibyendu Brinto Bose, Xiaoxiao Gan, Shawal Khalid, and Dr. Chris Brown. Their dedication and expertise have significantly enriched my work. I also extend my thanks to the MAOP and OUR programs for their generous support in my research endeavors.