



# Team Driven Development

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# Introduction

Who am I?

# My Background

- **Avid software developer from age 9**
- **Member and leader of several development user groups**
- **Previous roles**
  - **Earthlink Support Engineer**
  - **Helpdesk and Solutions Engineer for a small plastics company**
  - **Network Engineer for an IT Services Organization**
  - **Self Made Developer at said IT Services Organization**
  - **Senior Developer for an Automotive CRM company**
  - **Web Applications Developer at Esri**

**Why I Like Writing Software**

**What it means to me to be a  
carpenter of the web**

Why I like Doing It Alone

# The story of NetOps

Or how I convinced someone to pay me to write software

Why I Don't like it when others build software by themselves

# The story of the 3000 line Sproc

Or how I came to hate SQL

# Exploring the Process of Building Software

We've done this a few times now – it should be getting easier

# All the wonderful development philosophies

- Waterfall
  - Scrum
  - Agile
  - WAgile
  - Extreme Programming
  - Kanban
- 
- Or my favorite:
  - Post-it notes, Pizza, and a problem.

# Getting the Team Aligned

We don't have to get on the same page,  
but let's at least try to use the same book.

## Defining the team

**Getting all the great minds  
together to work on the same  
problem at the same time**

Take roll

**Learn the strengths and  
weaknesses of each team  
member**

**Never assume anything, ASK!**

## Let the team define the playbook

- **Agree on a tech stack and how new technologies will be evaluated.**
- **Let the team establish a coding standard, and other working parameters.**

Something to remember

**Make the team a safe place**

# Taking on new projects

Did you groom the backlog with your epic story about that sprint where you tripped and scrummed up your knee?

## What's working for us

- Project is presented to the team lead who briefs the team
- Team discusses, comes up with ideas and questions
- Team decides who is going to work on what parts
- Members are paired up on each responsibility
- Project owner and other stake holders are invited to meet with the team to kick things off

# Doing the Work

The art of getting things done.

## Some of our processes

- **Test Driven Development...**
  - **Red, Green, Refactor, Test, is closer to the truth.**
- **Team Driven Development**
  - **Pair, Tri, and even Quad programming at times**
  - **Asking each other for help**
  - **Trying things we don't know how to do**
  - **Experimenting as a team**
  - **Testing each other's work**
  - **Questioning each other's decisions**
- **Asking why a lot**
- **Building with our stakeholders, not for them.**

# Quality Assurance as a team

We have no QA Department (and that's a good thing)

## Some of our QA processes

- **Once code runs on one machine test it on another**
- **Deploy to testing servers often**
- **Show work to stake holders in increments**
- **Spend dev time with designers**
- **Test on multiple browsers and devices regularly**
- **Automation (unit tests, selenium tests)**
- **Team Code Reviews (before anything goes into production)**
- **Daily QA Demo / check-ins with lead**
- **Full project team reviews before launch**

# Improving our Skills

We are committed to learning and keeping our swords sharp

## **Our commitment to learning**

- **Sharing knowledge through the process of building software**
- **Demoing code and doing code reviews**
- **Setting aside time for self-improvement**
- **Trying new technologies on small projects**
- **Taking lead on areas not strong in**
- **Focus on learning non-technical skills**

# Nurturing the Team

Things I've found that work.

## Retrospectives

**Talk honest and openly about  
what's working and what's not**

Allow all things to be subject to change

## Retrospectives

**Always focus on the positive**

Don't take all the credit, share the love

## Retrospectives

# Never ignore the negative

Don't let it be someone else's fault

## Retrospectives

**Let the team make as many  
decisions as possible**

## Retrospectives

**Evaluate individual  
performance using team  
accomplishments**

## Retrospectives

**Don't dictate process, ask for results**

# Closing Thoughts

Let's reflect on this reflection.

## The things I'd like you to take away from this talk

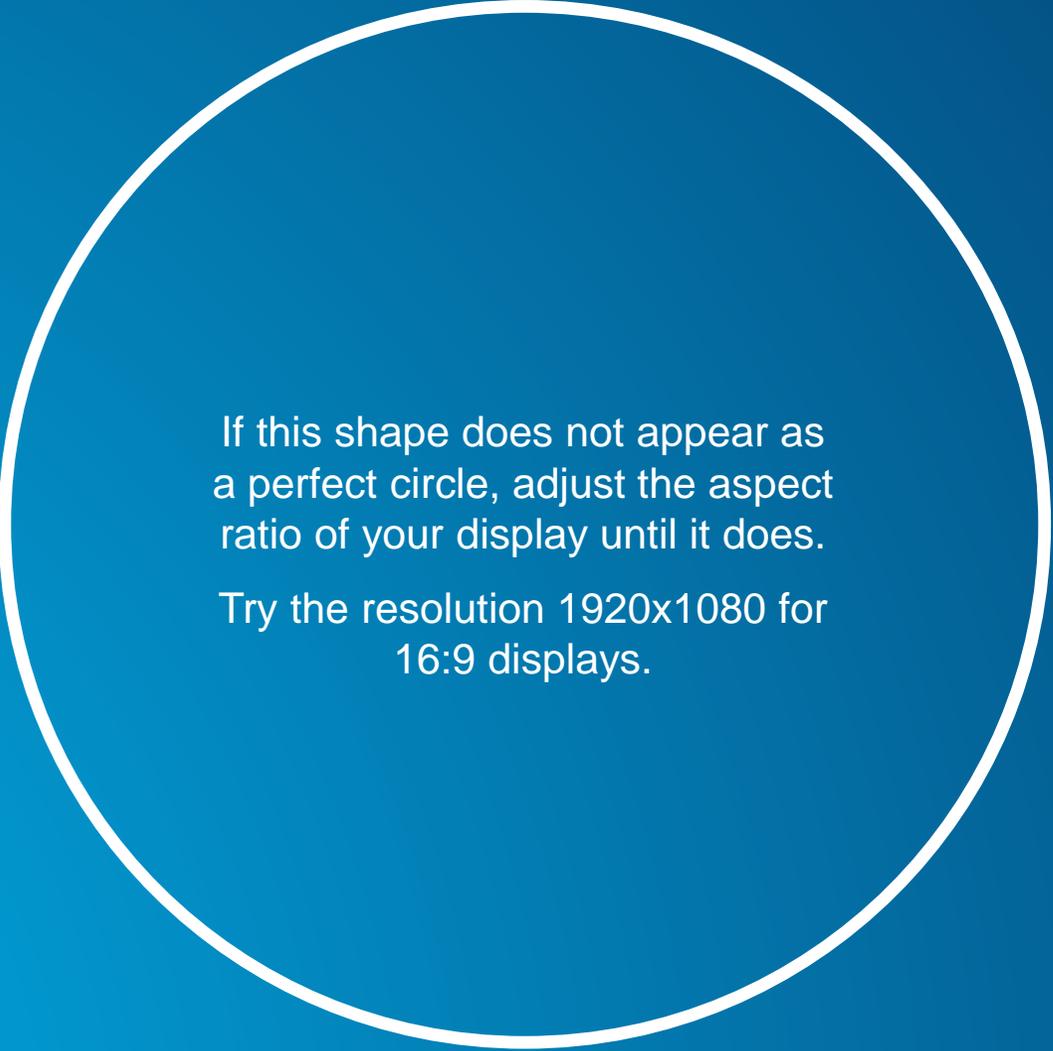
- People like interacting with others (even software developers)
- Building software should be fun
- There is no one right way to build software, but many proven ways to fail
- By letting the team self-manage interesting things happen
- Leading a team is about setting them up for success, not telling them how to succeed.



**esri**

**THE  
SCIENCE  
OF  
WHERE**

# Aspect Ratio Test



If this shape does not appear as a perfect circle, adjust the aspect ratio of your display until it does.

Try the resolution 1920x1080 for 16:9 displays.