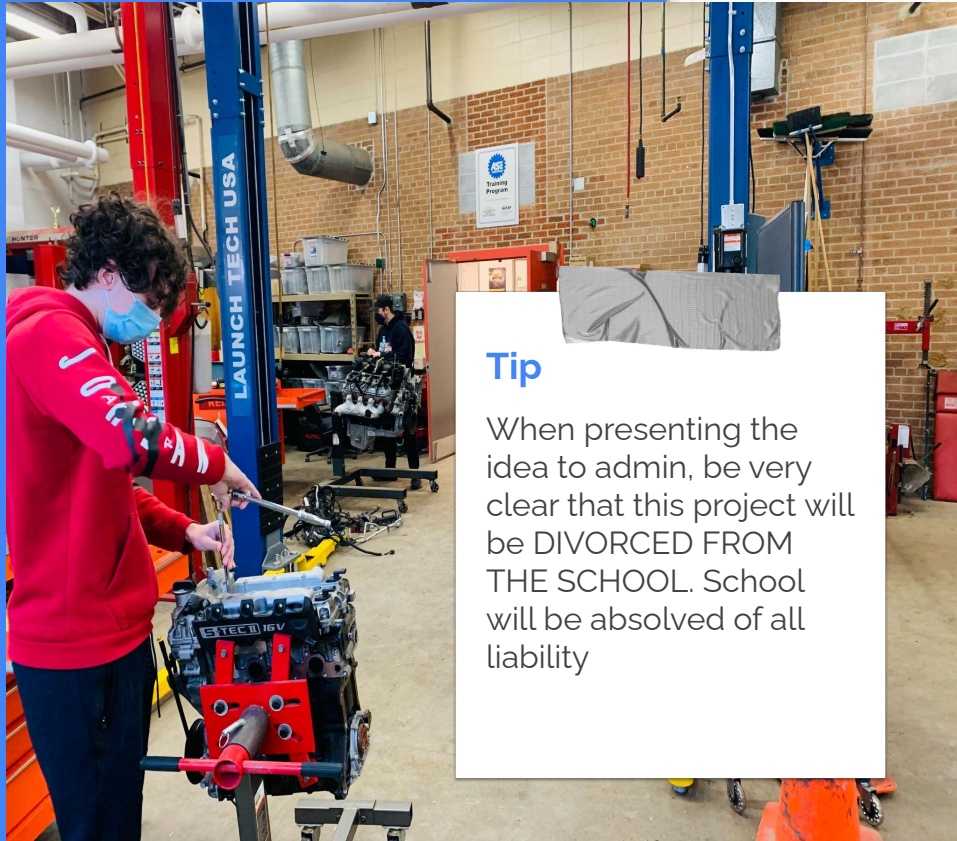


The Pros and Cons of Project-Based Learning in Advanced Autos

AKA don't do the dumb things I've done



Brian Hawn
Automotive Instructor
McFarland High School



Tip

When presenting the idea to admin, be very clear that this project will be **DIVORCED FROM THE SCHOOL**. School will be absolved of all liability

BEFORE YOU BOO ME AND WALK OUT-

- This is not for everyone
- Shop space, budget, patience and “want” are all factors
- Admin permission
- Hope you gain at least something from this!

Define Project-Based Learning

- Using unique automotive projects to teach ASE-required tasks
- Usually outside funded (more on that later)
- Projects that tend to reach beyond a typical shop car or customer vehicle (Think modification or restoration)

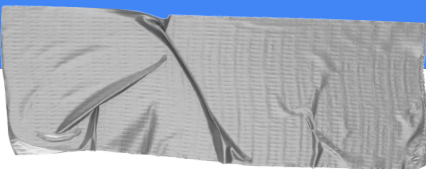




1. Intro to Pros

A quick layout of the pros of PBL:

- Student Engagement
- Ease of Differentiation
- Depth of Content
- Source of Program Pride



2. Intro to Cons

A quick layout of the cons of PBL:

- \$\$\$\$\$\$
- Grading
- Shop Space
- Amount of Work



Student Engagement

- Students feel empowered- get input and make decisions
- Improves engagement from the “flaky” kids; gives them ownership over a job
- They’re excited to see the final product!



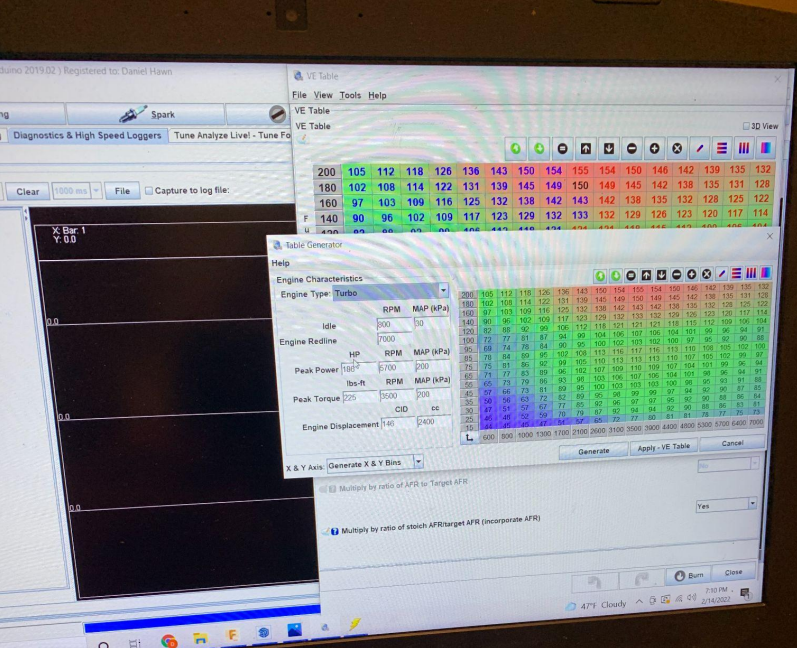
Tip

Explain the importance of each job related to the whole- the “flaky” kids don't want to let the other students down



Ease of Differentiation

- Improves instructors' freedom to tailor specific jobs to students' ability
- Pair lower-level students with higher achievers without making the lower-level feel dumb



Depth of Content

- Allows students to become their own experts on individual components
- Helps to teach the “how” of systems, not only the “why” (Spring rates on coilovers vs struts)

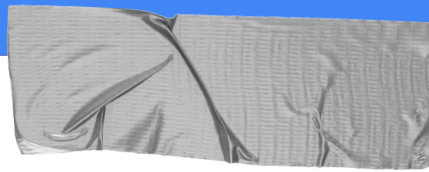
Tip

Require all groups to have an idea of what's going on in each group- allow for group “substitutes” in the event of an absence

Program Pride

- Students LOVE bragging about what they're doing in class
 - Friends in school
 - Friends in other schools
 - Cars N Coffee, Firestone Challenge Shows, Swap Meets, etc
- Ties each student into a bit of ownership in the Autos Program





Cons

A quick layout of the cons of PBL:

→ \$\$\$\$\$\$

→ Grading

→ Shop Space

→ Amount of Work

All About the Benjamin\$

- This will likely cost YOU money
- If the project is divorced from the school (**HIGHLY RECOMMEND**), then you'll fund the project personally
- Projects **ALWAYS** cost more than you think they will



Tip

Marry an accountant. They can help keep you on budget and make WAY more money than you do.

Grading

- Must have exact standards for each task
- Multiple tasks=multiple standards
- Need to find a way to equalize grades

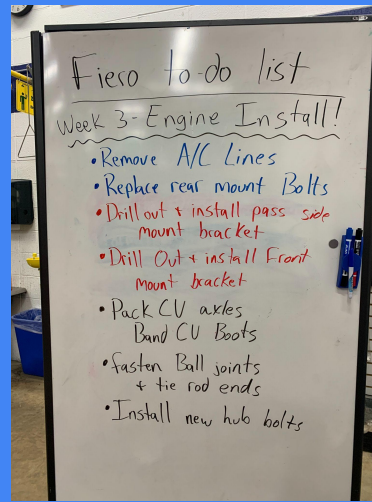




Shop Space

- Projects eat up shop space
- Recommend one stall (if possible) max for projects
- Keep auxiliary parts on rolling carts
- Store project in air as long as possible-keep larger parts/tools under the car

Work


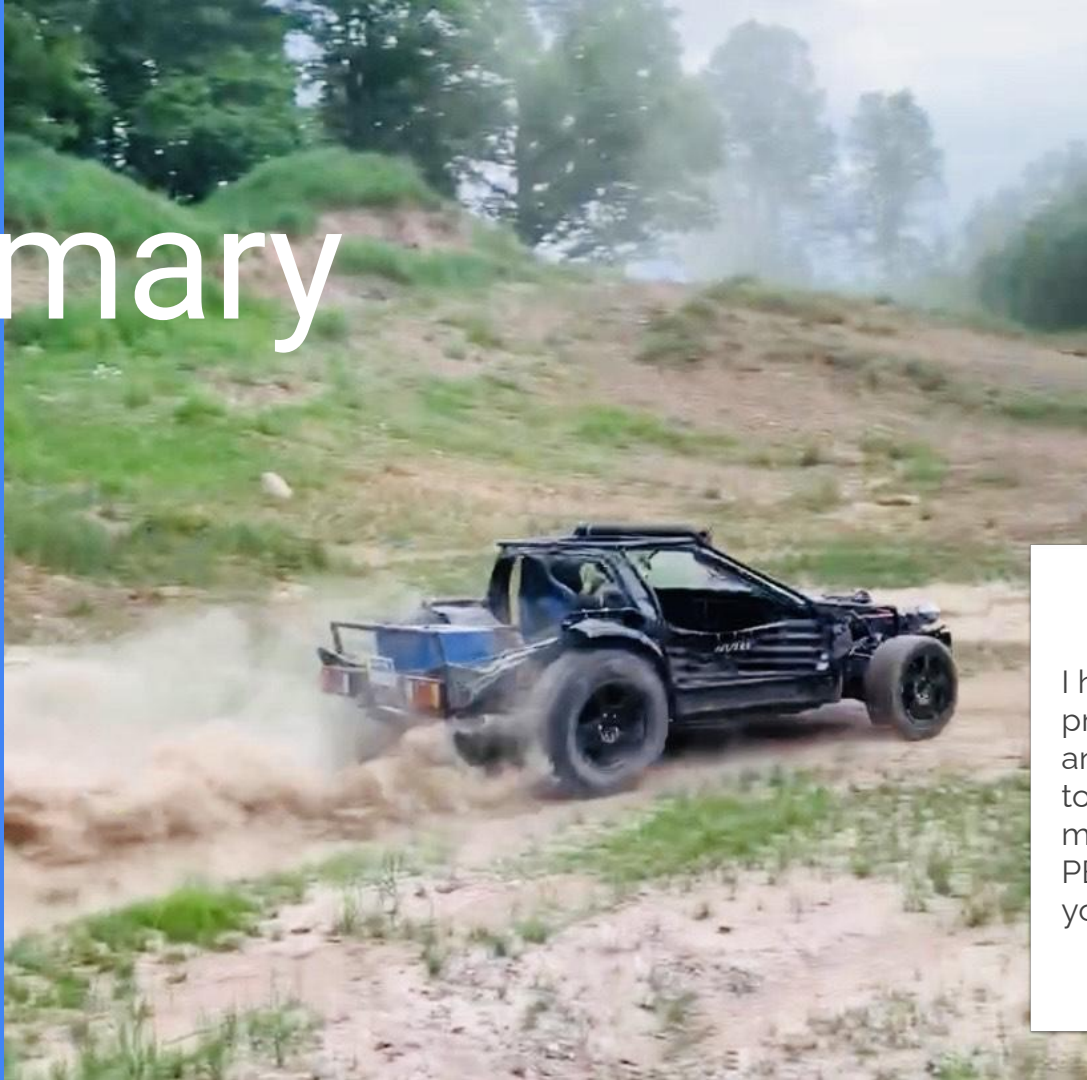


Projects are A LOT
of work for you

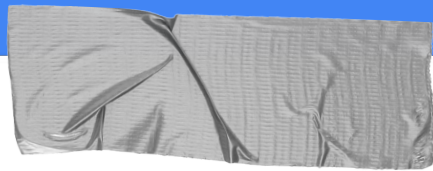
Make the students
do tasks that you
don't want to!



Summary



I have a blast with project-based learning, and the students seem to enjoy it. There are many pros and cons to PBL, but I encourage you to try it!



Examples

Here's some fun, dumb things we've built!

