



VANCOUVER ISLAND WEST SCHOOL DISTRICT 84

## **REGULAR BOARD MEETING**

**MONDAY, SEPTEMBER 11, 2017 – 4 PM**

School Board Office, Gold River, BC

### **A G E N D A**

# **Board of Education Vancouver Island West School District 84**

1. **CALL TO ORDER**
2. **APPROVAL OF AGENDA**
3. **ADOPTION OF MINUTES**
  - a. Regular Meeting of June 12, 2017
4. **BUSINESS ARISING FROM THE MINUTES**
5. **PUBLIC INQUIRIES AND PRESENTATIONS**
6. **CORRESPONDENCE**
7. **REPORT OF THE CLOSED MEETING**
8. **TRUSTEE REPORTS**
  - a. School Reports
9. **UNFINISHED BUSINESS**
10. **NEW BUSINESS**
  - a. The New School Year Begins!
  - b. 2016-2017 Audited Financial Statements
  - c. Actions for Learning Reports
  - d. Community Consultation Meetings for 2017-2018
  - e. Thank You to Summer Custodial and Maintenance Staff
11. **SUPERINTENDENT/SECRETARY-TREASURER/OPERATIONS SUPERVISOR'S REPORT**
  - a. District Update
  - b. Enrollment Report
  - c. Operations Report
12. **TRUSTEE INQUIRIES**
13. **PRESS AND PUBLIC INQUIRIES**
14. **NOTICE OF MEETINGS**
  - a. October 10, 2017 - 4 pm – Captain Meares Elementary Secondary School
15. **ADJOURNMENT**

*"In partnership with our diverse communities, School District 84 will provide all students with a quality education relevant to the demands of a modern society."*



**REGULAR MEETING OF THE BOARD OF EDUCATION  
FOR VANCOUVER ISLAND WEST SCHOOL DISTRICT 84,  
HELD ON MONDAY, JUNE 12, 2017  
IN THE SCHOOL BOARD OFFICE, GOLD RIVER, BC**

**TRUSTEES PRESENT:** Kathy Kennedy, Chairperson (Gold River)  
Jenniffer Hanson, Vice-Chairperson (Kyuquot)  
Fern Eastcott (Tahsis)  
Ken Pringle (Gold River)  
Gwen Alsop (Zeballos)

**ALSO PRESENT:** Lawrence Tarasoff, Superintendent/Secretary-Treasurer/Operations Supervisor  
Annie James, Human Resources Administrator/Recorder

**CALL TO ORDER:**

Chairperson Kennedy called the meeting to order at 4:05 pm. Welcome everyone!

**APPROVAL OF AGENDA:**

**2017:R-025** MOVED: Trustee Pringle, SECONDED: Trustee Alsop  
AND RESOLVED:  
*"TO approve the agenda."*

**ADOPTION OF MINUTES:**

**2017:R-026** MOVED: Trustee Pringle, SECONDED: Trustee Alsop  
AND RESOLVED:  
*"TO adopt the minutes of the Regular Board Meeting of May 8, 2017."*

**BUSINESS ARISING FROM THE MINUTES:**

Nil.

**PUBLIC INQUIRIES AND PRESENTATIONS:**

**a. Gold River Secondary School's Ambassadors to France**

Mr. Phil Parkes and Ms. Brettney Howard, together with their team of 'Student Ambassadors to France', travelled to France in March to promote School District 84. Partly funded by a grant from the Ministry of Education, the purpose of this business trip was to establish a culture exchange program for students in France and to build on that possibility. The students chosen for this trip came from a diverse background and had a very short period of time (20 days) to get their presentation together and were extremely successful in putting together a very professional and interesting presentation about School District 84. Some presentations were with classes and some were with superintendents and as a result, 60 letters of interest were received from students who are interested in coming to study in School District 84. There will be 10 students from France at Gold River Secondary School from October 6-November 4 and in return, 10 students from GRSS will travel to France to study for one month in March. Mr. Parkes and Ms. Howard both expressed how so very proud they were of the Student Ambassadors and for the terrific presentation that they put together. After this introduction, the students delivered their presentation to the Board of Education and each Trustee expressed how proud they were of a job well done!

**b. Gold River Secondary School's Student Exchange Program**

Mr. Jeff Rockwell and a group of students from Gold River Secondary School provided an enjoyable summary of the highlights of their Exchanges Canada trip to Hamilton, Ontario and the Hamilton students' trip to Gold River. These trips took much organizing and fundraising to make them happen,

and by all reports, both trips were extremely successful. The Trustees very much enjoyed the students' presentation which included a wonderful powerpoint presentation.

c. **Canada Wide Science Fair – Amber Pitt, Daniel Kornylo – Gold River Secondary School**

On May 13, 2017, Daniel Kornylo and Amber Pitt, along with their chaperone, Dave Kornylo, attended the 56<sup>th</sup> Canada Wide Science Fair held at the University of Regina. The host committee was very hospitable and made sure that everyone arrived to cheers, helped with luggage, an orientation package, and a comfortable room to rest in. The next day was a busy one of setting up projects, attending an orientation meeting and meeting the other finalists. Day 3 was judgement day with over 350 judges evaluating almost 500 science fair projects from across Canada. The following day, the students were treated to a trip to Saskatoon to tour Canada's brightest light source, the Synchrotron, at the University of Saskatchewan. This was followed by a presentation at the Ukrainian Museum and the bus ride home gave students the chance to enjoy the vast, horizon-to-horizon, prairie landscape. With the exception of the award ceremony, the remainder of the week was dedicated to public viewing of the projects, science seminars and demonstrations. The team from Gold River was very successful at the Canada Wide Science Fair and expressed appreciation to the Board of Education for the financial support to make this trip possible.

On behalf of the Board, Chairperson Kennedy congratulated Daniel and Amber for their success at the Canada Wide Science Fair, and expressed appreciation to Mr. and Mrs. Kornylo for their commitment to encouraging students in their wonderment and enjoyment of science!

**CORRESPONDENCE:**

- MADD Canada
- BC School Trustees' Association
- BCSTA
- Lawrence Tarasoff, Superintendent
- Director, NIC
- BCSTA
- Ministry of Education
- Vancouver Island School Trustees' Association
- BCSTA
- Claire Trevena
- BCSTA
- BCSTA
- Request for Funding Support by Placing an Advertisement in Yearbook
- Legal Bulletin – Video Surveillance on School Property
- BCSTA AGM 2017 Report of Proceedings
- Zeballos Salmon Fry Release
- Invitation to North Island College's 2017 Graduation Ceremony, June 20
- CSBA Congress 2017 and NTGAE Conference – July 2017
- Rural and Remote Workforce Sustainability Fund (RRWSF)
- Request for Feedback on Two Questions: (1) What are the top two professional learning needs of trustees? (2) What do they wish they had learned as new trustees?
- CSBA Congress 2017 and NTGAE Speakers You Don't Want to Miss!
- Congratulations to the Graduates of the Class of 2017
- CSBA Congress 2017 and NTGAE – One Month Until CSBA Congress/NTGAE – Have You Registered?
- Legal Bulletin – re Canada's Anti-Spam Legislation (CASL)

**2017:R-027** MOVE: Trustee Pringle, SECONDED: Trustee Eastcott  
AND RESOLVED:  
*"TO receive and file the correspondence."*

**REPORT OF THE CLOSED MEETING:**

Chairperson Kennedy reported that the Board discussed four labour and two land issues, approved the closure of the School Board Office to the public from July 17 to August 11 inclusive, met with students from Ray Watkins Elementary School, and also met with representatives of the Gold River Village Council. Chairperson Kennedy also reported that the Esperanza School will be re-opening.

---

## **TRUSTEE REPORTS:**

### **a. School Reports**

Trustee Alsop reported on a busy month at Zeballos School, preparing for the upcoming graduation ceremony and other end-of-the year events. The fish release took place and there will be a commemoration sign erected at the pond to describe the project. There are 16-20 students, plus their student teachers, who are looking forward to a field trip to Texada Island where the red carpet has been rolled out for the students. The Regional District provided the campsite for half price, the airport's aerospace camp will be providing a mini space camp for the students, they will enjoy hiking and swimming, and visiting an active self-sufficient working farm which produces meat and produce as well as exotic plants and shrubs. They will have an opportunity to visit a yurt, learn how to play on skim boards, and have a sandcastle contest. Not only that, but they will also get to enjoy glamorous donuts prepared by a master chef who lives on the Island! It will be a wonderful end-of-the-year celebration.

Trustee Eastcott reported that the Captain Meares calendar gets fuller as the school year winds down. Everyone has been enjoying having student teachers again this year. The secondary student teachers were able to join the high school students and several members of the community for a three-day wilderness first aid course. The course was very successful, with all of the students earning certification. The student teachers also helped students learn about electronics and electric circuits and students of every age group had a small project that they completed. On the last day of their visit, the student teachers organized an obstacle course with a twist. The students built masks that covered their eyes, but had LED lights inside that could be remotely controlled by a partner to indicate what direction the masked student needed to turn to navigate through the course. Everyone had a lot of fun with this activity.

The Breakfast Club and Farm to School lunch program continue to be very popular. Most students either eat breakfast at the school or at least stop by and pick up a piece of fruit. This month the intermediate students helped out with breakfast for a couple of days by baking banana muffins. The Farm to School garden bed has also been busy this month and thanks go to Terry Fassbender and Kim Anderson who have been busy getting the garden bed prepared for planting. This year's plan is to plant a low-maintenance crop that can be left over the summer and harvested in the fall and a new drip irrigation system should help reduce the need for work over the summer.

Mrs. Sanderson came for a visit and brought a very special gift for the elementary classroom – an egg sac full of praying mantis eggs. The students watched every day in anticipation of the hatch. There are now hundreds of baby mantises in the tank! Raising praying mantises isn't for the faint of heart. They start off eating fruit flies, but as they grow they will also start to feed on each other. Hopefully ten or so will survive to the adult stage.

Ms. Malthouse prepared and hosted the Ready, Set, Learn introduction to Kindergarten and the incoming students were invited to join the primary students for an afternoon of activities so they know what to expect in the fall. The afternoon was a great success; even the most reluctant new student didn't want to leave at the end of the day.

Shannon Fassbender had a great time joining the Gold River Secondary students for the second half of the exchange trip. Thanks to Mr. Rockwell and his crew of volunteers who made this possible.

The new elementary student teachers arrived last week, just in time to join in on a three-day canoe trip to Main Lakes Provincial Park on Quadra Island. Thanks to Mr. Parkes and to Allison Stiglitz for leading the trip. The trip was a great success; even though it got a bit wet at the end, the students returned with glowing reports.

With only three weeks left of school, there are still many events to occur. Sasha John will be heading to Zeballos this week to take part in the graduation ceremony. The elementary students have a field trip to Esperanza planned and there will be a school-wide trip to the Liener Campground for a day of outdoor activities and a campfire. Other activities include a Science Fair, the year-end celebration of learning and a community BBQ hosted by the Tahsis Seniors Society scheduled for the last day of school. It has been another great year at Captain Meares School!

Chairperson Kennedy reported on the May 31<sup>st</sup> PAC meeting at Gold River Secondary School which was Mrs. Charette's final meeting as her daughter graduates in June. A big thank you to Mrs. Charette for her tireless involvement in PAC throughout her daughter's school years. PAC elections were held, and Rachel Stratton will stay on as President, Mandy Howie will be the new secretary and Dave Kornylo the new treasurer. The Chemainus Theatre group were to visit the school this month but, given everyone's busy schedule, this has been postponed to September. It was decided that the PAC scholarship, "Student Spirit", will be shared by two students, Kobe Amos and Ben Westwood. Grad was held on June 10<sup>th</sup> with 15 grads looking nothing but fantastic as they made the walk with family by their side. The gym was decorated so tastefully with the Gold River wood theme – beautiful! The evening started off with the singing of 'O Canada', followed by two prayers and several speeches. The Valedictorian address was presented by Hannah Charette and Ben Westwood, who spoke of their school years in Gold River Schools as well as a chat about what the future holds. The final event was the presentation of awards which totalled about \$25,000. There were so many presenters and many tears, and it was truly a night to be remembered.

**b. District OH&S Committee Report**

Trustee Pringle reported on the May 29<sup>th</sup> meeting. Worksites provided a brief report of their health and safety activities, and the newly legislated annual evaluation of joint committees was discussed. Summaries of incidents/injuries and violent incidents were reviewed. The District OH&S Committee recommended to the Board of Education that the Board review its current policy regarding administering medications to students to determine if naloxone is included in Policy E.51 or if another policy is required and, also, that naloxone only be kept in areas where employees are trained and that staff training is voluntary. Vice-Principal Lees reported on the recent mouse situation at Gold River Secondary School which now seems to be under control. Last but not least, a special thank you to Ms. Norbjerg, Mr. Howell and Mr. Alsop for the leadership they have shown for health and safety issues in their worksite. Best wishes to Mr. Howell as he moves to a new Principal position in Dease Lake, and to Mr. Alsop and Mrs. Norbjerg who are both retiring at the end of this school year. The next meeting is scheduled for September 18, 2017.

The Superintendent/Secretary-Treasurer/Operations Supervisor noted that the District Principal of Special Education, Student Learning and Technology was already looking into a policy concerning naloxone prior to this District OH&S meeting, and information will be available as soon as possible.

**c. District Scholarship Committee Report**

Chairperson Kennedy reported that the District Scholarship Committee interviewed six students this year – Kobe Amos, Ben Westwood, Jazmyn McAllister, Hannah Charette, James Frame, and Keith Johnson – and all students discussed their futures and their post-secondary plans: a carpenter, an electrician, a heavy duty mechanic, an environmental scientist, a social workers, and a helicopter pilot. All students were awarded a monetary contribution from School District 84 towards their upcoming schooling and, as always, so proud of our students!

**UNFINISHED BUSINESS:**

Nil.

**NEW BUSINESS:**

**a. 2017-2018 School Fees**

The only fees in the District are optional fees for Ray Watkins Elementary School for Kindergarten to Grade 3 supplies (\$25 for each), and Grade 4-7 Agenda Homework Books (\$10).

**2017:R-028** MOVED: Trustee Pringle, SECONDED: Trustee Eastcott  
AND RESOLVED:  
*"TO accept the school fees for 2017-2018, as presented."*

b. **2017-2018 Codes of Conduct**

The Codes of Conduct outline expectations for students and give examples of some potential consequences for not meeting expectations. They also reference the BC Human Rights Code, and meet the Ministry's requirements for Codes of Conduct. The Superintendent/Secretary-Treasurer/Operations Supervisor recommended approval of the Codes, which are reviewed with staff and community each year.

**2017:R-029** MOVED: Trustee Pringle, SECONDED: Trustee Alsop  
AND RESOLVED:  
*"TO approve the Codes of Conduct as presented."*

c. **2018-2019 Capital Plan**

**2017:R-030** MOVED: Trustee Eastcott, SECONDED: Trustee Pringle  
AND RESOLVED:  
*"TO approve the 2018-2019 Capital Plan as presented."*

**SUPERINTENDENT/SECRETARY-TREASURER/OPERATIONS SUPERVISOR'S REPORT:**

a. **District Update**

As per previous reports.

b. **Enrollment Report**

The total enrollment of 440 students is holding reasonably steady.

c. **Operations Report**

The Operations Department is heading into a very busy summer. Once the dorms are completed, the crew will be moving on to several projects throughout the District, with the majority of this summer's work taking place in Kyuquot.

d. **Finance Warrants**

As at May 31, eleven (11) months or 91.7% of the 2016/17 fiscal year, and nine (9) months or 90.0% of the school calendar year has elapsed. The budget amounts shown in this Finance Warrant report are the 2016/17 Amended (Final) Budget amounts based on the September 30, 2016 actual enrollment for 2016/17.

Year-to-date revenue and expenses to the end of May 2017 is trending appropriately and within the total budget for the School District. At the end of June 30, 2016, the District had an Operating surplus of \$1,092,000 carried forward from 2015/16 to 2016/17, of which \$693,000 has been allocated, and \$399,000 is unallocated.

To the end of May 2017, \$4,988,000 or 91.4% of the Ministry Operating Grant has been received. To date, the Ministry Operating Grant is trending appropriately as budgeted.

To the end of May 2017, \$2,960,000 or 100.0% of the 2016/17 school year (LEA) Local Education Agreement has been recorded. The School District has received the final nominal roll from INAC and has adjusted the LEA billing accordingly for the balance of the school year. LEA revenue is trending appropriately within the budget.

To the end of May 2017, the total salaries and benefits expenditure is trending slightly to a surplus amount \$517,000 based on a prorated budget for the school year. The budget amounts shown are based on the Amended (Final) Budget that was approved in January 2017. To the end of May 2017, the service/supplies expenditures have a small surplus of \$25,000 as budgeted on a prorated budget basis. Note: For this finance warrant, the expenditures are approximately \$100,000 under-estimated due to the early composition of this May 2017 Finance Warrant.

Based on strictly actual revenues less actual expenditures, the School District is recording a small surplus of approximately \$697,000 for the year to the end of May 2017. This is due mainly to the LEA revenue being recorded for the entire year which creates a booked surplus of \$296,000, the Ministry of Education grant is about \$77,000 greater than anticipated and expenditures are understated by approximately \$100,000 due to timing. With the above adjustments, the adjusted actual surplus can be restated as \$301,000. With appropriated surplus of \$692,000 included in the actual analysis, the May 2017 adjusted surplus balance can be restated at \$993,000.

At the end of the 2015/16 fiscal year, the Annual Facilities Grant (AFG) had a surplus of \$589,000 being brought forward to 2016/17. To the end of May 2017, AFG received revenue of \$386,000 which totals \$975,000 available. To date, \$822,000 of expenditures has been incurred to the end of May 2017 (refer to detail chart). The balance remaining to AFG is \$153,000.

Future major AFG and Capital projects include:

- continue with LED lighting fixture upgrades;
- refurbishment of teacherages (employee housing) at Zeballos;
- boiler upgrade at Gold River Secondary School and the expenditure to May 2017 = \$47,000 and has \$216,000 of funds remaining. Any over-expenditures will be supplemented from the ZESS surplus balance.

To the end of May 2017, \$701,000 of bylaw capital funds is available to carry out major capital projects. To date \$368,000 of expenditures has been incurred to the end of May 2017. The balance remaining for all Bylaw Capital projects is \$32,000.

To the end of May 2017, \$191,000 of local capital funds is available to carry out major capital projects. To date, \$81,000 of expenditures has been incurred to the end of May 2017. The balance remaining for Local Capital projects is \$110,000.

**TRUSTEE INQUIRIES:**

Nil.

**PRESS AND PUBLIC INQUIRIES:**

Nil.

**NOTICE OF MEETINGS:**

The next public meeting of the Board of Education will be held on Monday, September 11, 2017, at 4 pm, in the School Board Office in Gold River. The public is invited to attend. Any requests for additions to the agenda should be forwarded to the School Board Office two weeks prior to the meeting. Note: Board meeting minutes are posted on the District's website at <http://www.sd84.bc.ca/board-meetings-school-district-84>.

**ADJOURNMENT:**

Chairperson Kennedy declared the meeting adjourned at 6:15 pm.

# Actions for Learning – GRSS Board Games for Instruction

---

Ken Lees – Teacher/Vice-Principal

Missy Haynes – Teacher

The motivation for this project was to consider how some board games can help learners understand the concept of rules, practice following rules and reason about moral problems. Additional benefits of board games for students can include: board gamers can detect patterns, plan ahead, predict the outcome of alternative moves and learn from experience. Our initial plan was to work with senior students to use board games in the classroom to teach thematic curricular units while instilling the aforementioned student qualities and to increase students' critical thinking skills while enjoying the company of others.

Ken Lees had made some purchases of board games such as Stratego (four copies) and Chess (four copies) for trial use in junior classes and later use in senior classes. He had used these games on school overnight field trip (Camp Homewood) and when our school welcomed international students from Shang Hai. The early results were observable. Student engagement was high, collaboration was demonstrated and students learned about working together to understand the rules and competing with each other to win the activity. Some students started to seek out our 'games tote' for use when curricular studies were complete.

The intended goals were not completely fulfilled. The major intention was to work with senior students. Ken Lees did not teach a senior class this year and Missy Haynes was not able to participate fully in this AFL due to personal health matters. Games use in junior classes did not meet the expected objectives and this allows for optimism for expanding the project in the next school year.



Joshua Ogden & Michael Preston  
jogden@viw.sd84.bc.ca  
mpreston@viw.sd84.bc.ca

June 27, 2017

Lawrence Tarasoff  
ltarasoff@viw.sd84.bc.ca

RE: AFL Report

To Lawrence,

We (Joshua and Mike) used our AFL funds to work on the question of how an outdoor classroom can facilitate nature-based environmental learning experiences for students. With the AFL funds, we were able to purchase building materials for two outdoor classrooms: at KESS, a cleared campfire area with bench seating for twenty; and at HPK, a vegetable garden enclosed by a picket fence.

We found that an outdoor classroom is indeed a useful setting for nature-based environmental learning experiences. We take our students to these outdoor classrooms often, and there facilitate such learning as fire-building, Nuu-chah-nulth language, Nuu-chah-nulth culture, weather, life cycles, and physical activity. We look forward to using these outdoor classrooms regularly in years to come.

Warmly,  
Joshua Ogden & Mike Preston

**Actions for Learning Final Report:  
TPRS as a method for learning the Nuu-chah-nulth Language**

*I. What the project was looking at*

This year we began exploring how TPRS (Teaching Proficiency through Reading and Storytelling) could be applied to teach the Nuu-chah-nulth language to young learners. This method tells a story using very simple and repetitive vocabulary, and checks for understanding with simple yes or no questions, as you go. We thought this method might be effective in a context where full immersion isn't possible due to a lack of teachers who are fluent in the language.

*II. Who took part*

The following people took part in the project: Helen Jones (Primary teacher, KESS), Mindy Ogden (Kindergarten Teacher, HPK), Daisy Hansen (Language Teacher, KESS), Adam Werle (transcriber, UVic).

*III. What you found out*

We experimented with TPRS in the Fall with the kindergarten class, doing a story called "The bear who didn't listen". The story taught introductions, animal names, the command to "please listen" and how to answer a Yes/No question. In the story, Black Bear repeatedly mishears Deer's name and calls him by the wrong name, until he realizes he had water in his ear, and finally hears deer's actual name. This story wasn't fully translated into Nuu-chah-nulth, but it confirmed to us that this method could work with this age group. We used pictures instead of words to help with comprehension, and had students help act out the story. The kids were engaged and learned what we hoped they would. They performed the story as a puppet show at the Christmas concert and it was well received by community members. After that success, we met with the language teacher, Daisy, to come up with some more story ideas. We came up with some, but unfortunately, Daisy got injured and we were unable to work on the stories for some time. We also realized we would need further expertise to fully translate the stories into Nuu-chah-nulth. So, we contacted Adam Werle and he was happy to be involved. We also realized that in addition to the stories, the students needed extra practice to fully master the new vocabulary. We decide to invest in a membership to a flashcard website and have begun the process of digitizing Nuu-chah-nulth vocabulary, and are looking forward to adding audio. This is a great tool for days when Daisy is away, and can be used in higher grades as well or for interested adults in the community. Overall, we learned the importance of collaboration, even though it can be a slow process. We look forward to fully incorporating this language learning method next year.

# *As easy as Raspberry Pie: Building an RC car*

## Project Background and Purpose

With ADST becoming a course that is built into the curriculum from kindergarten to grade 9, there is an expectation to build towards high level, challenging, exciting projects in the latter years. Our goal to incorporate Raspberry Pi, a single board computer, to build a project seemed to meet these goals. The physical building was a continuation from our science unit on electricity in Adam's science 7-9 class, where we learned about current, electromotive force, and resistance. Luke worked on setting up and programming the Raspberry Pi and Arduino boards to perform functions such as making a set of LEDs, wired through an electrical circuit, blink. Luke also worked on teaching programming to elementary students. David worked on building a foundation of programming using Hour of Code and Scratch.



## Outcome and Outlook

Luke and Adam became very involved in ADST integration and attended a "Training the trainer" workshop on ADST and "coding" in Victoria with Missy Haynes and Stephen Larre. This led to the Curriculum Implementation Day workshop on ADST where they presented to all of the district teachers. Luke led a workshop introducing teachers to teaching programming to elementary students using the Scratch platform. David joined the group and introduced teachers to Hour of Code. Adam led an introductory workshop on HTML and Quite Basic.

In Adam's class, students worked well with new technology to put together a RC car. Students had to be very careful putting the car together as there were many complicated parts with multiple boards, motors and sensors. These all had to be joined with solderless connections which made the job a little easier but still challenging to connect the dozens of wires to the correct ports. This required a lot of problem solving as the instructions were sometimes not as obvious as they could have been. This was well received by the students who could see that they were building something really cool that they had not seen in a school setting before. We would recommend the kit (Elegoo Smart Robot Car Kit) used. For our group of about seven students one kit was used. This worked well as our students needed help following instructions and needed an adult directly supervising the group. The group did a good job of taking turns with tools and there was enough building to go around. With more independent students, probably 3 students per kit would be ideal. Programming proved challenging. David had worked with the students using Kahn Academy's Hour of Code and Scratch which gave us a leg up. The native programming language of the robot is Python, which is a full on coding language. Skill with this would take time to develop.

Overall, we were pleased with the results. Students got an introduction to programming, followed most of the steps of the ADST programing - ideating, planning each step, evaluated if their work was correct, made revisions when they discovered errors to make a final build. If we had been able to continue, we could have added more iterations of prototypes and used the robot to solve problems. This would be great as it would lead to the ADST cycle repeated with programing as well as the physical build. This was a very good project for digging into ADST.