CONNECTICUT STATE DEPARTMENT OF EDUCATION

The Early Indication Tool (EIT)

Practical Uses and Implications for Attendance Teams and Building Leaders

Presented by

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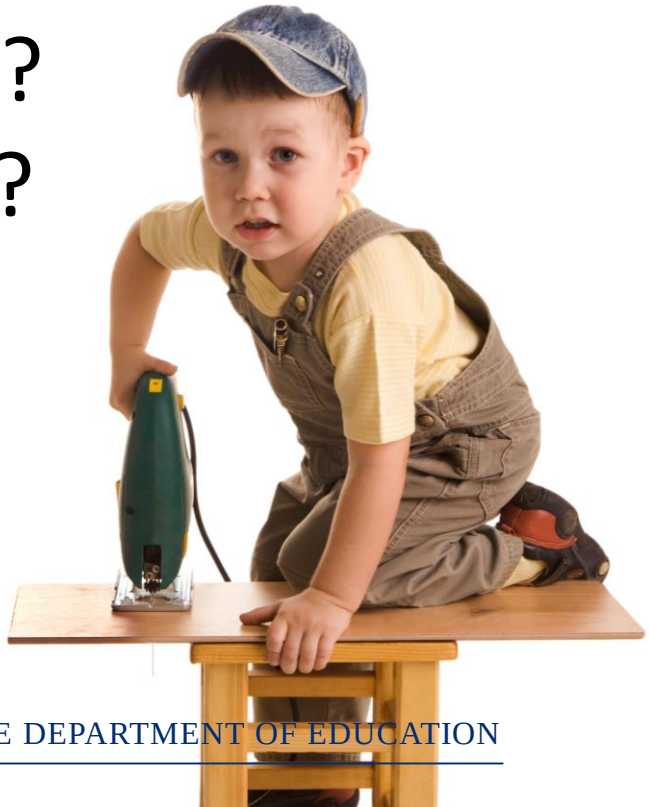
Early Warning System (EWS)

Data analytics **tool** that **uses readily available education data** to **systematically *predict* and *improve* student outcomes**

What EWS tools do you use?

- For each tool:
  - What is the tool?
  - What data does it include?
  - What is the methodology?



Additional Attendance Considerations

- **Ambivalence and/or Alienation**
  - Ineffective teaching
  - Staff turnover
  - Teacher absenteeism
  - Classroom chaos
  - Bullying
  - Correlation: Overall vs. specials day

Chang, H., & Romero, M. (2018). *Present, Engaged, and Accounted For*

What is **EdSight Secure**?

EdSight Secure

- Secure Online Data Portal
- For Designated LEA Staff
- Access Student-level Data
- View Charts and Tables
  - Filter and Disaggregate
  - Export

How do I gain access?

Designated by Superintendent

LEA Security Manager creates account or assigns role

Wait one hour to login

Find your LEA Security Manager at: https://portal.ct.gov/SDE/Performance/Data-Collection/Help-Sites/Directory-Manager//-/media/SDE/Performance/Data-Collection/Help-Sites/Directory-Manager/LEASecurityManagerContactList.pdf

What reports are available?

Students

- Early Indication Tool (EIT)
- FAFSA Completion

Educators

- Educators with Active Endorsements

Performance

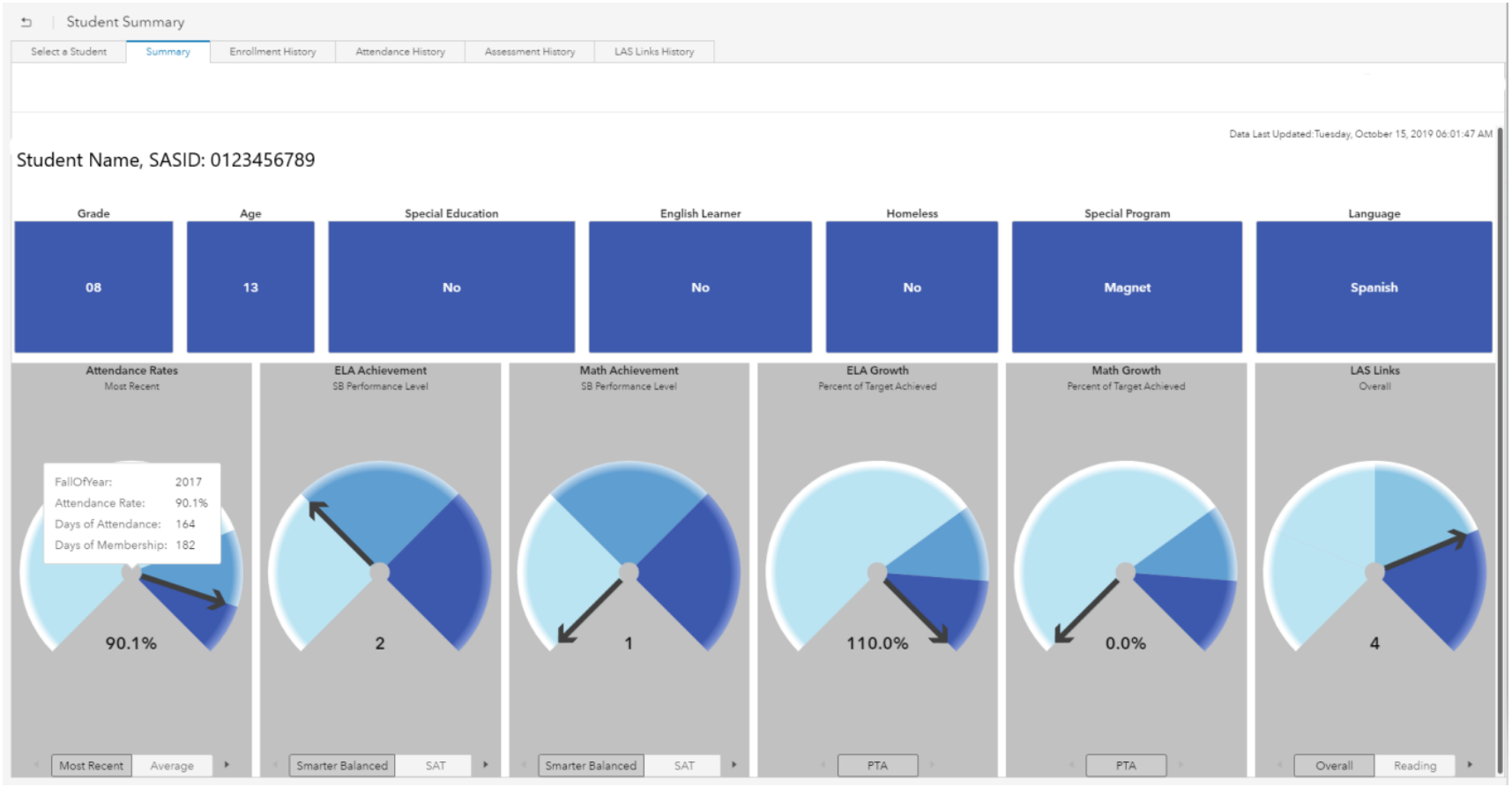
- CMT/CAPT Science
- Connecticut School Day SAT
- Smarter Balanced Achievement
- Smarter Balanced Growth
- LAS Links Achievement/Mastery
- LAS Links Growth

What reports are coming soon?

- **Next Generation Science Standards (NGSS)**
  - Similar look/feel of current assessment reports
- **Student Summary**
  - Single-student profile
  - Dashboard with most current information
    - Grade, Age, Special Education Status, English Learner Status, Homeless Status, Special Program Status, Language, Attendance Rate, English Language Arts/Math Achievement and Growth, LAS Links
  - Separate tabs with historical data
    - Enrollment, Attendance, Assessment, LAS Links

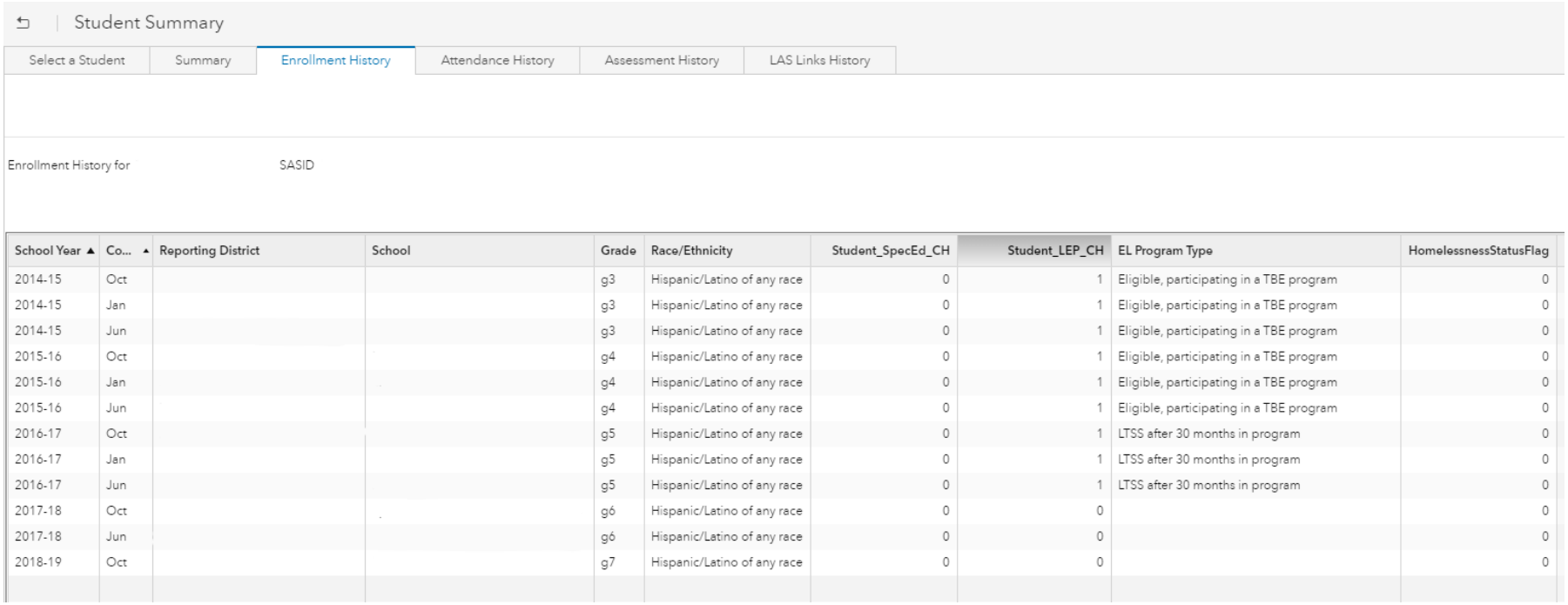
Student Summary

Dashboard



Student Summary

Historical Data Page

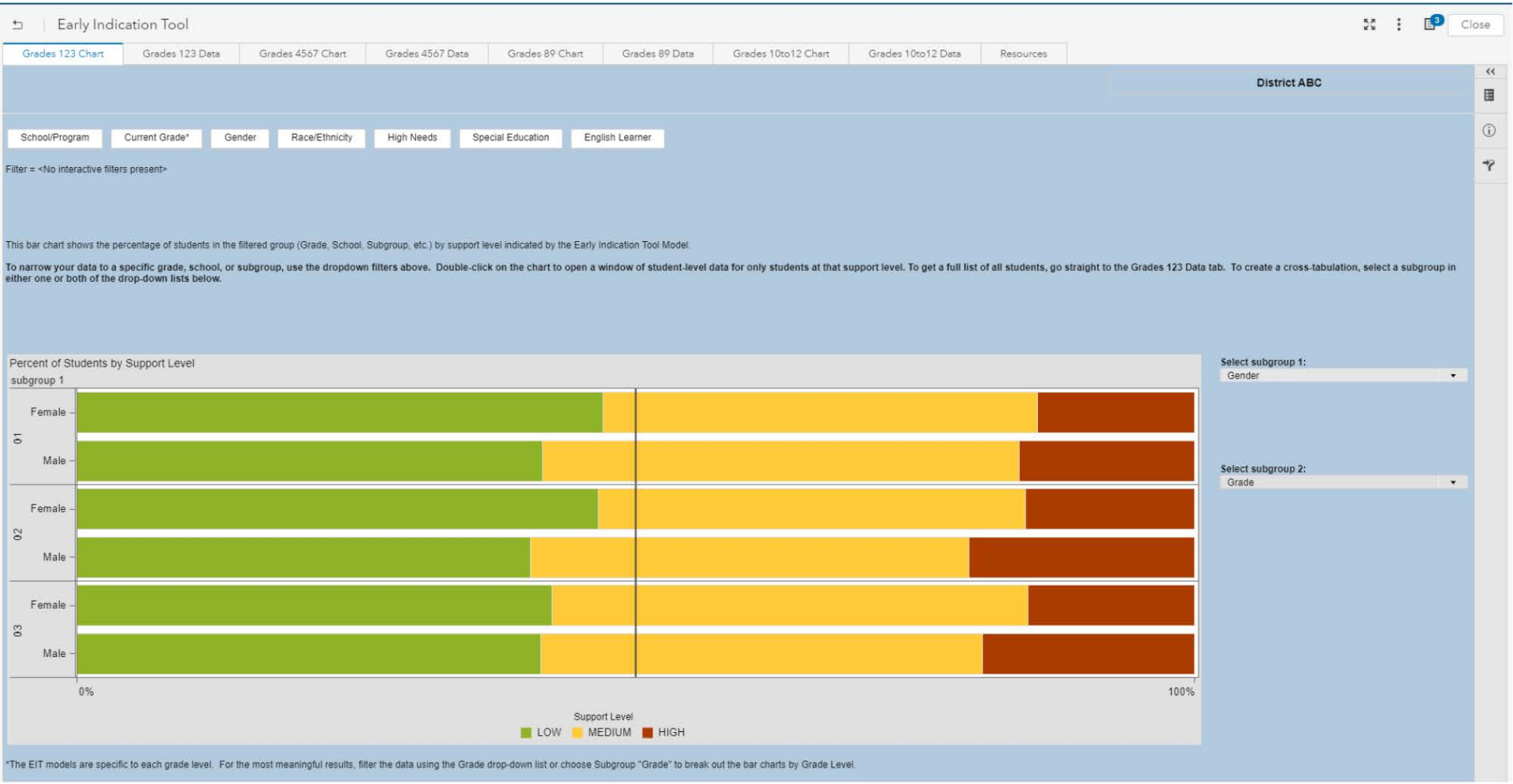


School Year	Co...	Reporting District	School	Grade	Race/Ethnicity	Student_SpecEd_CH	Student_LEP_CH	EL Program Type	HomelessnessStatusFlag
2014-15	Oct			g3	Hispanic/Latino of any race	0	1	Eligible, participating in a TBE program	0
2014-15	Jan			g3	Hispanic/Latino of any race	0	1	Eligible, participating in a TBE program	0
2014-15	Jun			g3	Hispanic/Latino of any race	0	1	Eligible, participating in a TBE program	0
2015-16	Oct			g4	Hispanic/Latino of any race	0	1	Eligible, participating in a TBE program	0
2015-16	Jan			g4	Hispanic/Latino of any race	0	1	Eligible, participating in a TBE program	0
2015-16	Jun			g4	Hispanic/Latino of any race	0	1	Eligible, participating in a TBE program	0
2016-17	Oct			g5	Hispanic/Latino of any race	0	1	LTSS after 30 months in program	0
2016-17	Jan			g5	Hispanic/Latino of any race	0	1	LTSS after 30 months in program	0
2016-17	Jun			g5	Hispanic/Latino of any race	0	1	LTSS after 30 months in program	0
2017-18	Oct			g6	Hispanic/Latino of any race	0	0		0
2017-18	Jun			g6	Hispanic/Latino of any race	0	0		0
2018-19	Oct			g7	Hispanic/Latino of any race	0	0		0

What is the EIT?

A data analytics and visualization tool that uses statistical methods to systematically predict and improve student outcomes

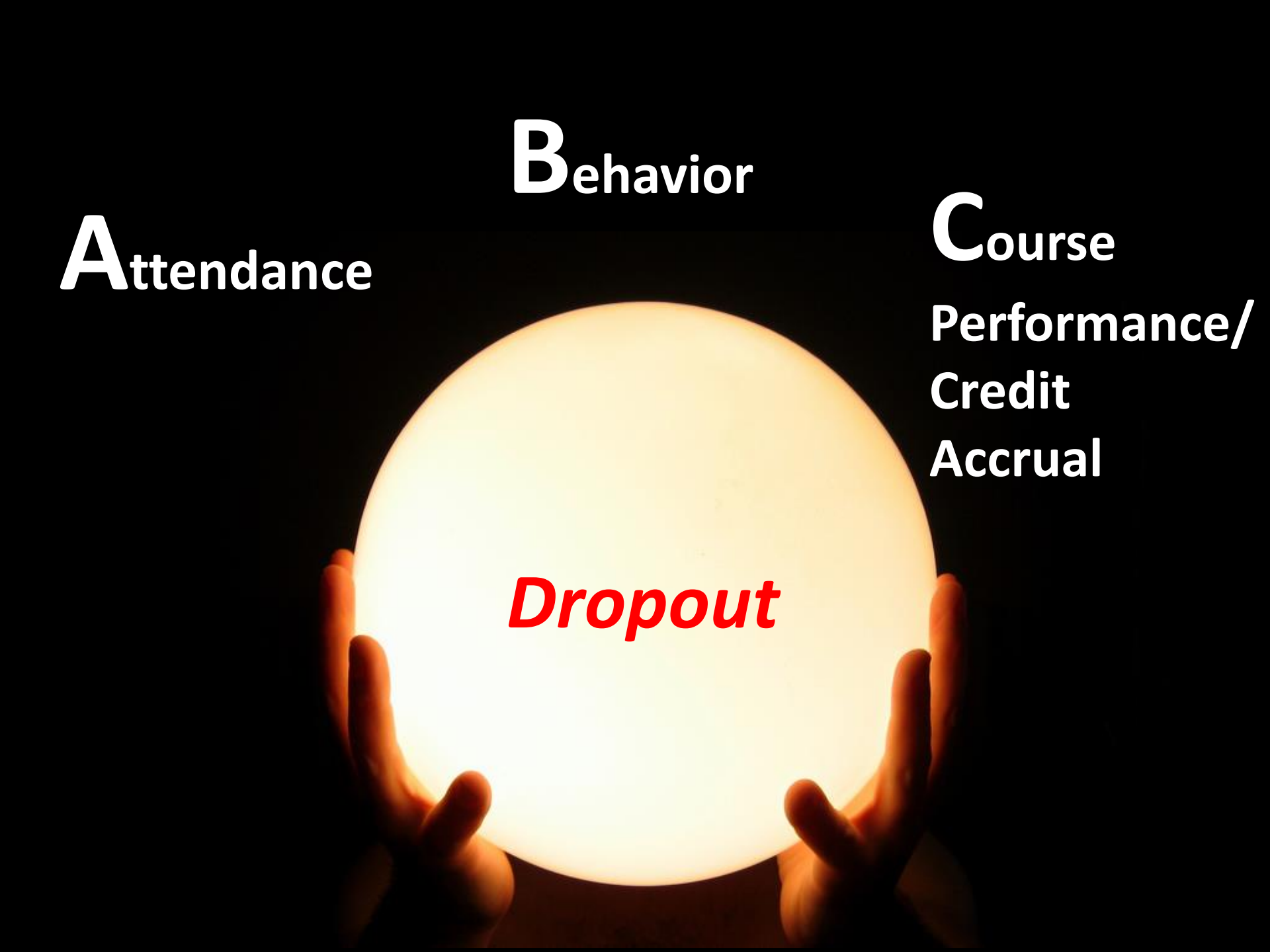
EARLY INDICATION TOOL (EIT)



Primary Purpose of the EIT

To ***allow for timely student interventions*** by district/school staff with the ultimate goal of ***improving student engagement and outcomes***

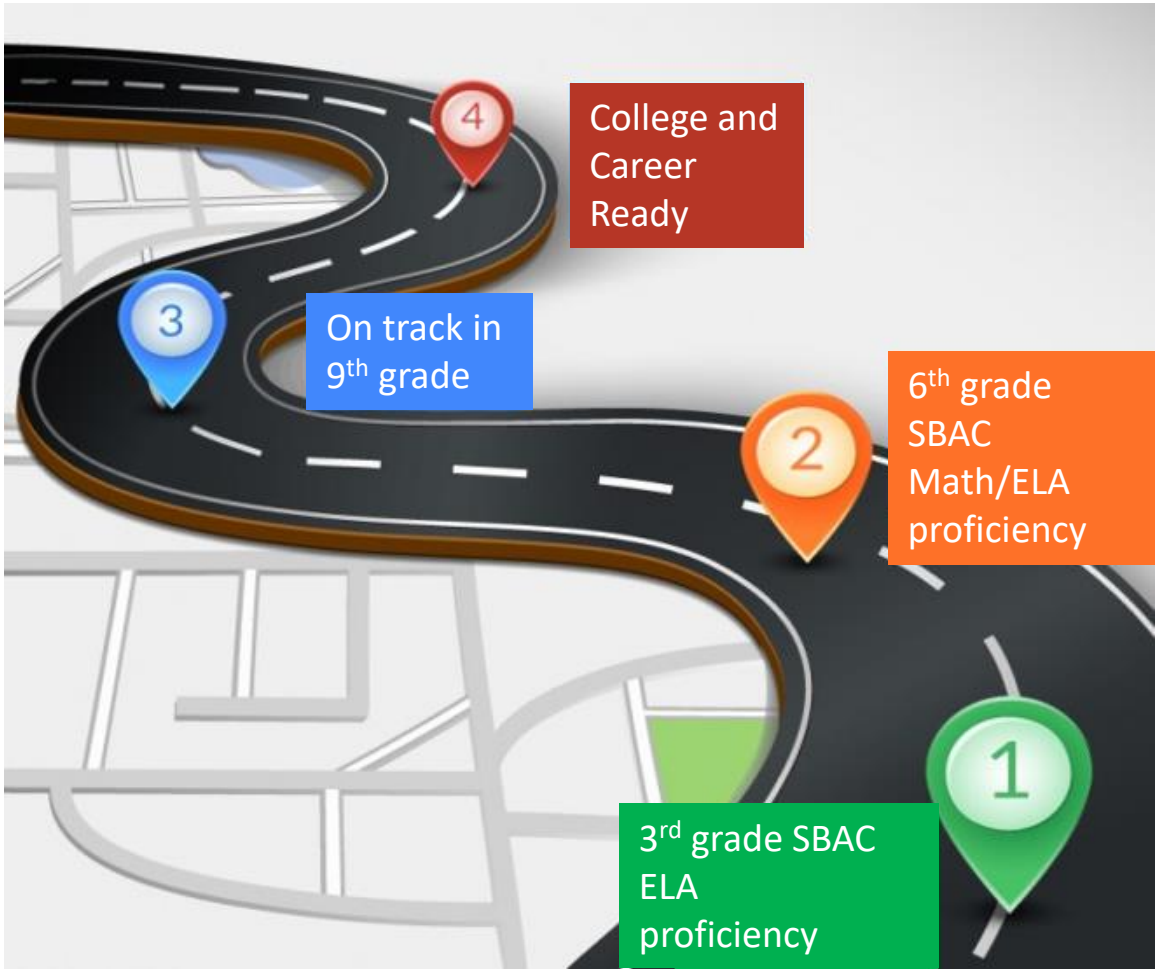
(aligned to Connecticut's ESSA Plan for provision of student supports)


Attendance
Behavior
Course
Performance/
Credit
Accrual
Dropout

Attendance
Behavior
Demographics
Mobility
Achievement Tests
School Indices
Academic Milestone
Course Performance
District Indices

MILE MARKER APPROACH

Markers serve as **targets** for students, and as **dependent variables** in the EIT model



What does the EIT report?

- **Secure student-level data**
  - Demographics
  - Attendance Rates
  - Suspensions
  - Mobility
  - Achievement
  - Course performance
- **Targeted support level**
  - High, Medium, or Low

EIT Predictors (grade-invariant)

The following are included in all EIT models:

- **Attendance**
- **Behavior**
- **Mobility**
- **High Needs status**
- **Detailed special education data**
- **Retention; age in grade**

Graduation Rates
SWD

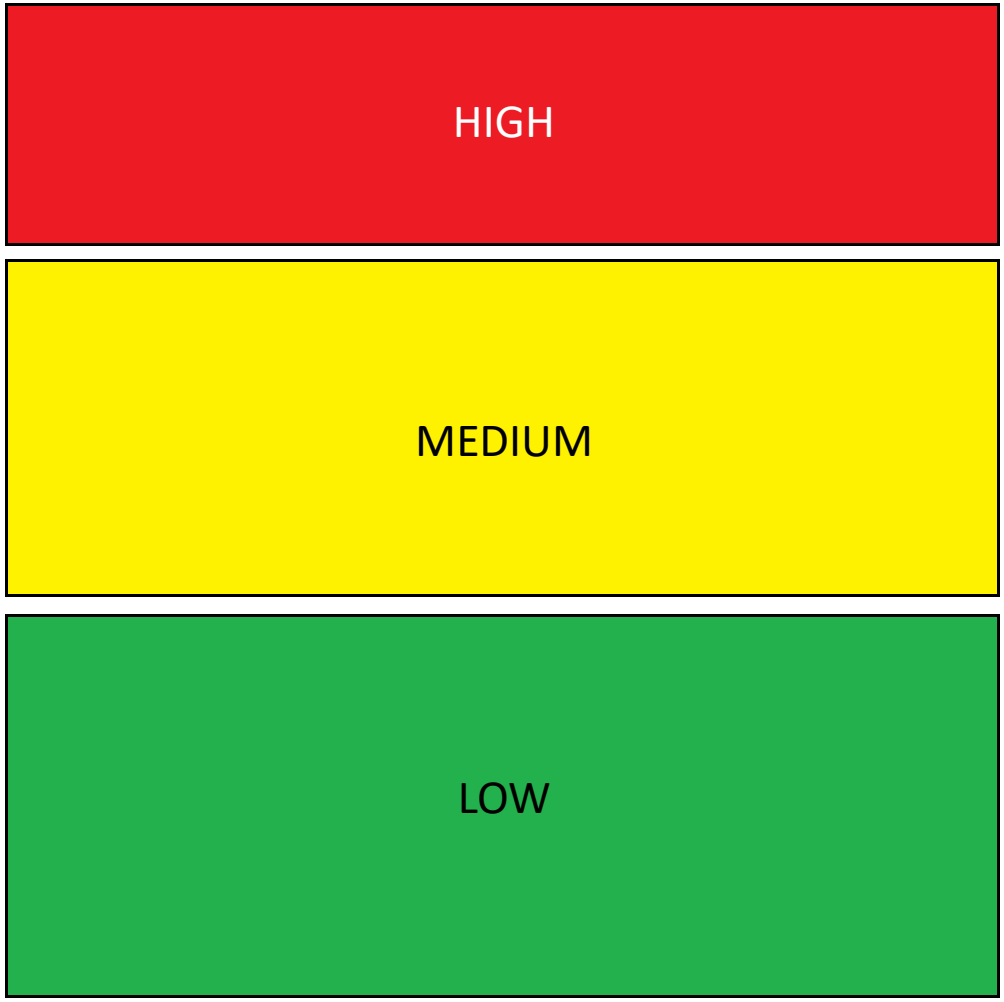
Subgroup	Four-Year Graduation Rate	Five-Year Graduation Rate
Students without Identified Disabilities	67.10%	69.60%
Two+ Years below Grade Level	45.50%	49.00%
Learning Disability	47.80%	52.70%
Mild Cognitive Disability	41.70%	47.20%
Emotional Disturbance	18.70%	23.50%
Speech/Language Disabilities	58.10%	63.50%
Physical/Sensory Disabilities	75.00%	77.50%

Source: Gwynne, J., Lesnick, J., Hart, H. M., & Allensworth, E. M. (2009)

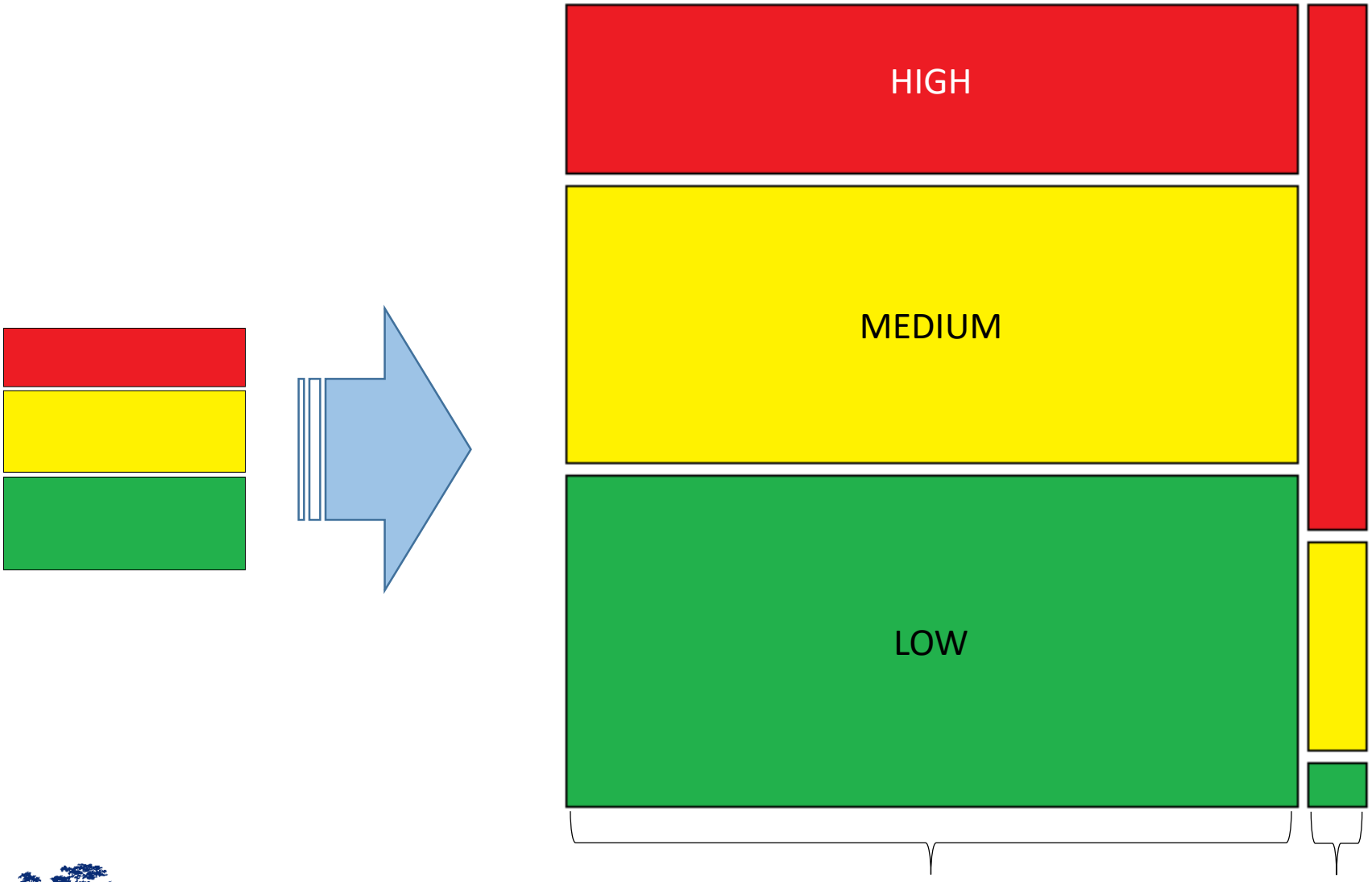
Machine Learning

Data mining techniques and computer algorithms to understand patterns in data to solve problems

Support Levels



Support Levels by Chronic Absentee Status



How to Get the Most out of the EIT EdSight Secure Report

Sections By Student Grade Levels

Bar Charts of Support Levels

Filters, lattices, flyovers, info windows

Data lists

Numerical and Character Filters

Color coded data display

Sorting student-level data

Resources tab

Support links

Student support best practices links

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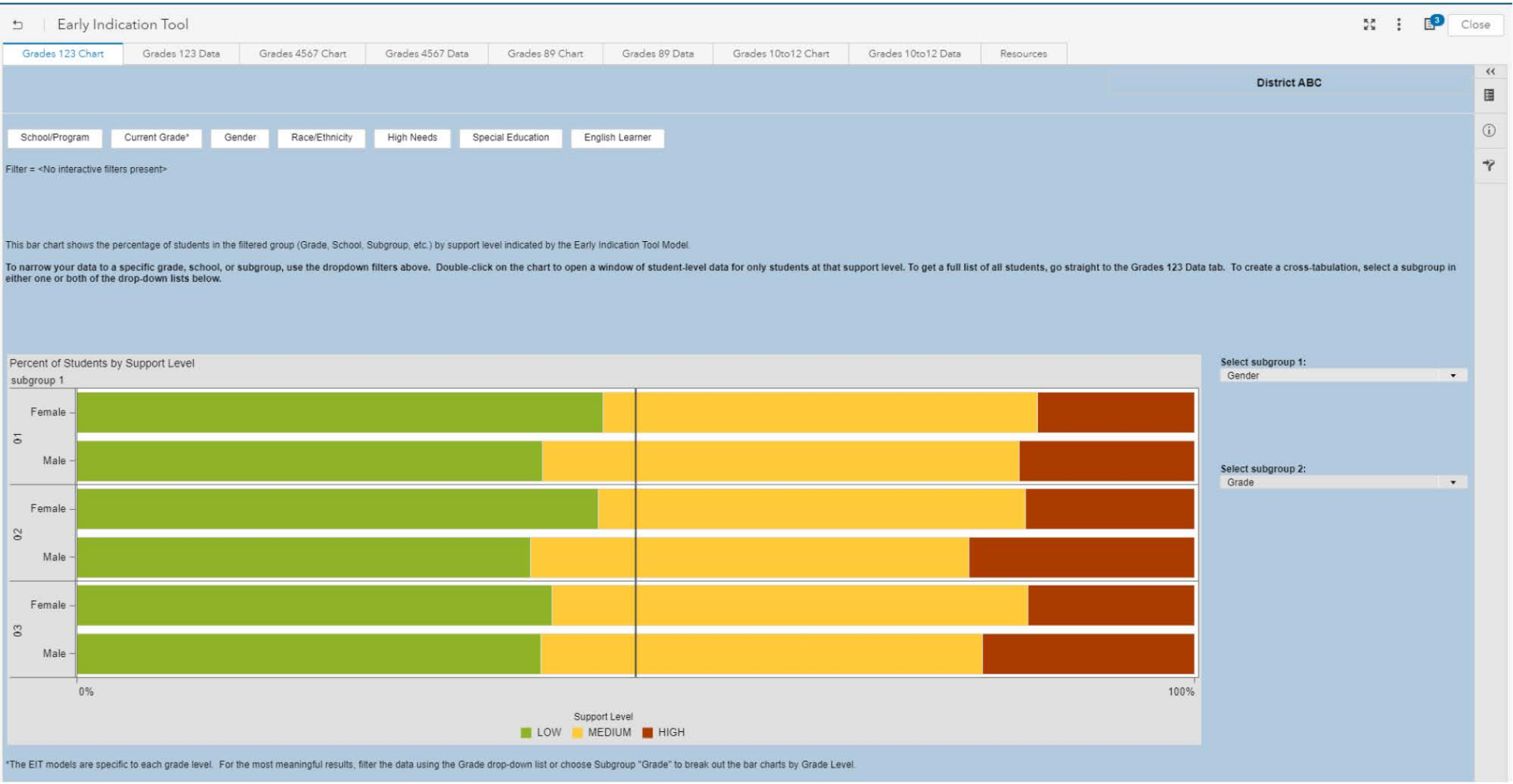

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EARLY INDICATION TOOL (EIT)

OVERVIEW

The EIT is a K-12 system that uses statistical methods to identify clusters of students who are at-risk of missing milestones and/or dropping out, and ***ultimately facilitates more timely interventions by assigning targeted student support levels***.

INFORMATION & ACCESS

The EIT provides **color-coded longitudinal data** and **visualizations** to school and district users in a secure fashion via EdSight Secure.

THE DASHBOARD

Filters

One row per student (*)

Options to maximize, save, and export

Summary data by column

Demographics and special populations status fields

Two years of attendance, achievement, mobility, discipline, and retention

Targeted Student Support Level (as determined by the EIT model)

* Additional fields, including student ID, name, and date of birth, are displayed in the EIT

Please email questions and comments to the EdSight Help Desk at EdSight.SDE@ct.gov

EIT: Suggestions

- Compare EIT support levels with your EWS results
- Remember: Variability matters
  - Filter and/or sort to differentiate
- Look beyond thresholds
- Avoid silos
  - Consider interactions between variables
- Use findings to dig deeper and/or start a conversation

LOOKING AHEAD…

- Grades 1 through 12
  - Models will be run in the Fall semester using the 2018-19 data and updates will be available soon thereafter
- ***New:*** Student Summary
- More conversations like today
- Continuous improvement of models and reports
- Expanded Targeted Support Library

THANK YOU!

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