

Guide to High-Quality Professional Development



BALTIMORE COUNTY PUBLIC SCHOOLS

GUIDE TO HIGH-QUALITY PROFESSIONAL DEVELOPMENT

Division of Curriculum and Instruction

Baltimore County Public Schools
Towson, Maryland 21204
July 2013

Board of Education of Baltimore County

Towson, Maryland 21204

Lawrence E. Schmidt, Esq.
President

David Uhlfelder
Vice President

Michael Bowler

Charles McDaniel, Jr.

Michael Collins

George J. Moniodis

Edward J Gilliss

H. Edward Parker

Rodger C. Janssen

Romaine N. Williams,
Esq.

Marisol A. Johnson

Johnathan P. Galla
Student Representative

S. Dallas Dance, Ph. D
Secretary-Treasurer and Superintendent of Schools

Towson, Maryland
2013

BALTIMORE COUNTY PUBLIC SCHOOLS

TABLE OF CONTENTS

MESSAGE FROM THE SUPERINTENDENT	v
ACKNOWLEDGMENTS.....	vi
OVERVIEW.....	1
PURPOSE.....	1
PROFESSIONAL DEVELOPMENT VISION, MISSION, AND COMMITMENTS	2
HOW TO USE THE GUIDE TO HQPD.....	4
PROFESSIONAL DEVELOPMENT ORGANIZATIONAL COMPONENTS.....	4
PROFESSIONAL DEVELOPMENT CYCLE.....	5
Component 1: Needs Assessment.....	6
Component 2: Professional Development Year-at-a-Glance.....	7
Component 3: Activity and Calendar Development.....	8
Component 4: Registration and Attendance Reconciliation.....	10
Component 5: Evaluation.....	10
SUPPORT FOR THE PROFESSIONAL DEVELOPMENT CYCLE.....	12
GLOSSARY OF TERMS.....	13
BIBLIOGRAPHY.....	15
APPENDICES.....	17
Appendix A: Data-Driven Decision Making for Planning Professional Development..	18
Appendix B: Professional Development Year-at-a-Glance Form.....	22
Appendix C: Professional Development Year-at-a-Glance Rubric	23
Appendix D: Matrix of Professional Development Strategies and Activities.....	24
Appendix E: Matrix of Hybrid, Online, and Video-Based Delivery Methods.....	31
Appendix F: Adult-Learning Principles and Strategies.....	37
Appendix G: Maryland Teacher Professional Development Standards	40
Appendix H: Guide for Professional Development for New/Revised Curriculum Implementation and Support	45
Appendix I: Evaluating Professional Development.....	49

MESSAGE FROM THE SUPERINTENDENT

July 2013

Dear Reader:

The leaders and staff of Baltimore County Public Schools are committed to preparing all students for success in college, careers, and life. We recognize that the quality of the educational experiences we provide depends in large measure on the preparation of our staff and support of stakeholders. For that reason, we are focused on the continual improvement of our professional development initiatives.

This guide establishes central control and coordination of all professional development – including the identification of needs, systemic delivery of services, and evaluation of effectiveness in raising student achievement.

The comprehensive plan presented on these pages provides the organizational structure for this central control and coordination and was developed in collaboration with a diverse group of stakeholders including school-based and central office personnel.

The implementation of this plan represents an additional step for creating a culture of deliberate excellence through the acceleration of student achievement and district and school improvement.

Sincerely,

S. Dallas Dance, PhD
Superintendent

ACKNOWLEDGMENTS

Special thanks are extended to the following representatives, who participated on the Professional Development Workgroup and in the development of the Guide to High-Quality Professional Development:

Cathy Armstrong	Administrative Assistant, Department of Professional Development
Barbara Bisset	Principal on Assignment, Department of Professional Development
Cathy Cerveny	Technology Integration Teacher/TABCO Rep., Pinewood Elementary
Mary Dagen	Resource Teacher, Department of Research, Accountability and Assessment
Sharon Grimes	Supervisor, Office of Library Information Services
Sharon Hoffman	Supervisor, Office of Language Arts PreK-12
Jeanne Imbriale	Coordinator, Department of Professional Development
Carol Johnson	Specialist, Department of Research, Accountability and Assessment
Thea Jones	Supervisor, Office of Instructional Technology
Max Khan	Technical Trainer, Department of Professional Development
Jeff Lifton	Manager, The Education Channel
Merry Macer	Principal on Assignment, Department of Professional Development
Anne Mehall	Supervisor, Office of Language Arts PreK-12
Linda Meyer	Lead Technology Trainer, Department of Professional Development
Tom Michocki	Coordinator, Office of Science PreK-12
Nancy Ostrow	PTA President
John Palmer	Assistant to the Area Assistant Superintendent, Northeast
Joyce Reier	Personnel Officer, Department of Human Resources
Diane Rymer	Supervisor, Department of Professional Development
Sandy Skordalos	Social Studies Teacher/TABCO Rep., Patapsco High
Dan Scroggs	Manager, Department of Technology
John Staley	Coordinator, Office of Mathematics PreK-12
Robert Tomback	Area Assistant Superintendent, Northeast
Nicole Tucker-Smith	Supervisor, Department of Professional Development
Michele Wagner	Webmaster, Department of Technology
Verletta White	Executive Director, Department of Professional Development
Joseph Wojciechowski	Enterprise Systems Engineer, Department of Technology

OVERVIEW

Baltimore County Public Schools (BCPS) is committed to ensuring high-quality professional development for all of its educational stakeholders. BCPS has developed the Guide to High-Quality Professional Development (Guide to HQPD) to outline systemic processes and procedures to guide the planning, implementation, and evaluation of professional development initiatives. The efforts summarized in this guide are intended to provide:

- Central control and coordination of all professional development.
- Professional development opportunities to meet organizational, group, and individual learning needs in a systemic manner.
- Systemic and coordinated delivery of needed knowledge and skills focused on improvement of student achievement.
- Systems of evaluation to determine the effectiveness of professional development in terms of learner achievement.
(Phi Delta Kappa International, 2007)

PURPOSE

The Guide to HQPD is designed to ensure the quality and alignment of BCPS professional development initiatives with systemwide goals to improve student learning. It is a guiding document for use by all educational stakeholders responsible for providing professional development within BCPS.

The Guide to HQPD outlines criteria and expectations for high-quality professional development. The purpose of this guide is to serve as a road map for the planning, implementation, and evaluation of all professional development initiatives. High-quality professional development for all stakeholders is essential to the BCPS mission to provide a quality education for all students.

PROFESSIONAL DEVELOPMENT VISION, MISSION, AND COMMITMENTS

Vision

Baltimore County Public Schools creates, develops, and sustains a learning community that values continuous learning and improvement and includes all stakeholders as teachers and learners.

Mission

The mission of the Department of Professional Development is to provide and guide high-quality growth opportunities for all employees as they develop and apply the knowledge and skills necessary to ensure that all students learn.

Commitments

High-quality professional development begins with a structured planning process. This process requires all educational stakeholders responsible for providing professional development to analyze data to determine needs, prepare meaningful professional development plans, monitor participation in professional development offerings, and evaluate the change in participant learning by observing behavior and/or examining student performance. High-quality professional development addresses the context, process, and outcomes of professional learning.

Context

1. Powerful professional development takes place in learning communities committed to continuous improvement and ongoing inquiry.
2. Adequate resources are required to support adult learning and collaboration.
3. Technology is an important component in the delivery of professional development.

Process

1. Professional development reflects systemwide priorities, policies, and procedures.
2. Professional development organizational components guide the three phases of the change process: initiation (introductory phase), implementation (ongoing support phase), and institutionalization (embedded practice and review phase).
3. The Professional Development Cycle begins with a needs assessment that reviews student achievement data, the needs of diverse learners, and input from stakeholders.
4. Yearlong professional development plans identify objectives based on system needs and expected results for student achievement.
5. Professional development activities are aligned with high-quality standards and adult-learning principles.

6. Professional development is evaluated through an online survey tool.

Outcomes

1. Professional development is collaborative, continuous, standards-focused, research-based, and intellectually rigorous.
2. Professional learning opportunities lead to changes in participant behavior and increases in student achievement.
3. Professional development activities provide educators with the knowledge and skills needed to involve families and community members as active partners in meeting the needs of all students.
4. Results are documented using an internal auditing process, such as the *ISO 9001:2008 Model*.

HOW TO USE THE GUIDE TO HQPD

The Guide to HQPD provides a framework for assessing systemwide needs, planning professional learning activities, and evaluating professional development initiatives. This guide outlines the organizational, technology-based components that have been developed to ensure consistency, effective planning, and systemwide coordination.

PROFESSIONAL DEVELOPMENT ORGANIZATIONAL COMPONENTS

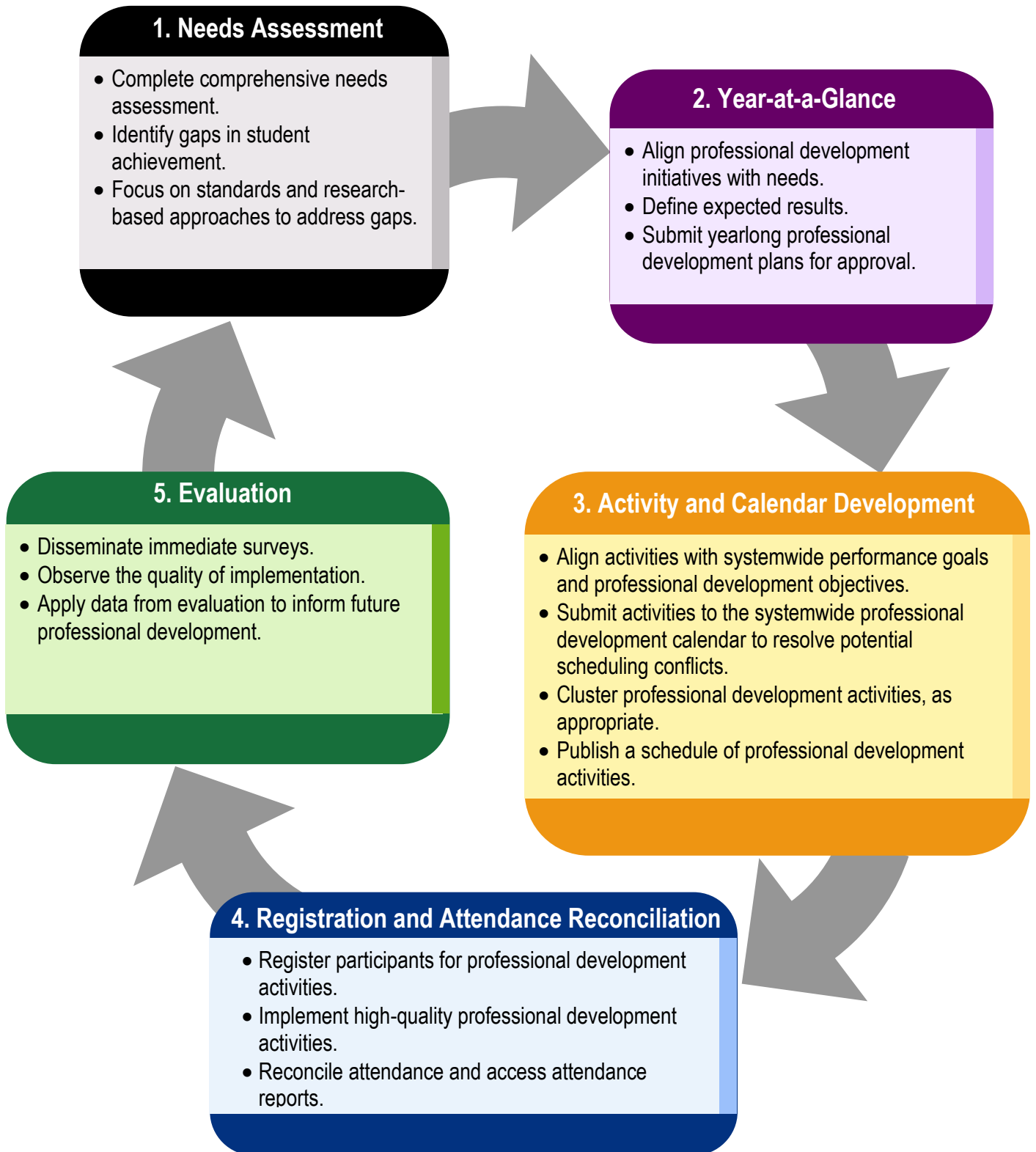
The prioritizing, planning, delivering, and evaluating of high-quality professional development require robust infrastructure and organizational systems. The design and implementation of user-friendly systems provide mechanisms for structuring the collection, analysis, and reporting of necessary data. This information is gathered through an online submission, approval, registration, and evaluation process and is compiled in a data warehouse system. The professional development organizational components guide and ensure:

- Alignment of the professional development initiatives with system priorities and state standards.
- Thoughtful planning of outcomes, indicators, activities, and ongoing support.
- Calendar posting and resolution of potential scheduling conflicts.
- Registration and attendance reconciliation, linked to reimbursement (where applicable).
- Data analysis through needs assessments, session surveys, and observations.

The Guide to HQPD includes the development and implementation of the following technology-based components:

1. Needs Assessment
2. Professional Development Year-at-a-Glance
3. Activity and Calendar Development
4. Registration and Attendance Reconciliation
5. Evaluation

PROFESSIONAL DEVELOPMENT CYCLE



Component 1: Needs Assessment

Offices will begin the professional development planning process by examining system-level and school-based data sources to identify student achievement gaps and priority needs. Using a root-cause analysis model and focusing on standards and research-based approaches, offices will determine the professional knowledge, skills, and strategies required to address the gaps and priority areas. (See Appendix A: Data-Driven Decision Making for Planning Professional Development.)

Purpose

Data (both quantitative and qualitative) inform the planning and implementation of high-quality professional development initiatives. An effective needs assessment structure is required to ensure that professional development efforts are appropriately targeted. Professional development initiatives more directly benefit student learning by focusing on areas of need.

Procedures

School improvement teams and central office personnel should access existing data sources and work in collaborative teams to identify gaps in student performance. A gap is defined as the difference between what students know and are able to do and what they are expected to know and be able to do. Data sources may include:

- Student learning (standardized tests, norm/criterion-referenced tests, teacher observations of abilities, authentic assessments).
 - School process (description of school programs and processes).
 - Demographics (enrollment, attendance, drop-out rate, ethnicity, gender, grade level).
 - Perceptions (perceptions of learning environment, values and beliefs, attitudes and observation).
- (Learning Point Associates, 2004, p. 8)

During the needs assessment component, the following questions should be addressed:

- What are the priority needs of the system/school?
- What are the current gaps in student performance?
- What are the current gaps in group performance?
- What patterns stand out (strengths/weaknesses)?
- What are the areas of strength and/or areas of weakness over time (trends)?
- What are the existing systemwide/schoolwide initiatives?
- What do we need to do differently?
- What professional knowledge, skills, and strategies will address the priority needs and root causes?

Schools and offices will complete the needs assessment by identifying the audience(s) to participate in the professional development. Audiences may be identified according to their position (e.g., teacher, department chair), geographic location (e.g., Northwest Area, Southeast Area), grade level (e.g., elementary, middle, high), level of experience (e.g., first year, veteran), and/or other targeted priorities. By identifying the staff who will be engaged in the content, the differentiated professional development offered will avoid a one-size-fits-all approach.

Component 2: Professional Development Year-at-a-Glance

Schools and offices will use the information from the needs assessment to create a yearlong professional development plan. Schools will include their professional development activities in their School Improvement Plan. Offices will submit their plan to executive leadership and the Department of Professional Development for approval. All plans will be reviewed according to the following criteria:

- Alignment with the *Blueprint for Progress* and system priorities.
- Clear alignment among the results of the needs assessment, the description of the proposed professional development, and the expected results.
- Inclusion of all targeted audiences.
- Identification of key personnel and budget implications.
- Overall feasibility of the yearlong plan.

Purpose

The Professional Development Year-at-a-Glance component allows for articulation between and among offices. The Year-at-a-Glance structure establishes a framework for integrating initiatives related to the BCPS mission to provide a quality education for all students. (See Appendices B and C.) Through the executive leadership and Department of Professional Development approval process, this function provides for systemwide coordination of professional development initiatives.

Procedures

Offices will utilize the Professional Development Year-at-a-Glance planning tool to submit a yearlong plan to executive leadership and Department of Professional Development for approval. Each yearlong plan should identify the following information:

- Title of each initiative
- Identified need(s)
- Description of professional development
 - PD objective
 - Delivery method(s)
 - Audience(s)
- Time frame for implementation

- Expected results – What will be different as a result of this professional development? How will the results be measured?
- Person(s) responsible
- Funding source

Offices developing a yearlong plan that incorporates a new/pilot or revised curriculum will outline professional development initiatives to support curriculum implementation. Initiatives related to curriculum implementation will consider the following questions:

- What professional development is needed for curriculum writers?
- What do teachers, paraprofessionals, and administrators need to know and be able to do in order to implement the new and/or revised curriculum effectively?
- What is the plan for ensuring that all users of the guide have access to the new information?
- What is the timeline for the roll-out of the new curriculum?

If a yearlong plan is not approved by executive leadership and Department of Professional Development, the office must address the missing or insufficiently completed criterion/criteria and resubmit the plan. Offices that receive approval from the Department of Professional Development may proceed to the third component of the Professional Development Cycle.

Component 3: Activity and Calendar Development

Upon receiving approval of yearlong plans, offices will submit activity requests through the Professional Development Cycle. Activities may include workshops, trainings, and other professional learning sessions. (For resources and research related to high-quality professional development strategies and activities and technology-based delivery methods, see Appendices D and E.) Each activity request will be submitted to the appropriate administrator. The calendar development tool will resolve potential scheduling conflicts.

Purpose

The activity and calendar development component ensures that each professional learning activity is aligned with the Performance Goals outlined in the *Blueprint for Progress*. Embedded in the structure of the activity and calendaring component are the following elements:

- Standards for high-quality professional development.
- Adult-learning principles. (See Appendix F.)
- The Maryland Teacher Professional Development Standards (Appendix G)
- Opportunities for job-embedded practice.
- A variety of professional development approaches, including the use of hybrid, online, and video-based delivery models.

Procedures

Offices will submit a request for each proposed activity through the Professional Development Cycle. The activity and calendar request will include the following fields:

- Activity Details
 - Title
 - Description (This description will forward to the systemwide professional development calendar and the online Registration System.)
 - Sponsoring Offices
 - Activity Type
 - Subject Area
 - Grading Type
- Default Audiences
- Outcomes and Indicators
- Blueprint for Progress Alignment
- Offering Details
 - Number of Participants
 - Related Departments
 - Offering Manager Name and Contact Information
 - Registration Catalog
- Alignment with Initiatives
- Curriculum Development Phase (if applicable)
- Implementation dates, time, and location

For activities that support curriculum implementation, the Activity and Calendaring Component will prompt offices to connect curriculum-related professional development offerings to one of the three phases of the change process: initiation (introductory/pilot phase), implementation (ongoing support phase), or institutionalization (embedded practice and review phase). Offices planning professional development related to a new or revised curriculum may reference a guide (Appendix H) that outlines considerations specific to curriculum implementation and support.

School leaders may collaborate with offices to schedule clustered professional development activities. A biannual, searchable catalog of professional development activities will be available online.

Component 4: Registration and Attendance Reconciliation

Once activities have been approved and posted on the systemwide professional development calendar, participants will register for professional development offerings.

Purpose

The registration and attendance reconciliation component provides for organizational, group, and individual development in a systemic manner. This system has been designed to allow employees to register for professional development offerings by offices within the BCPS system. Participant attendance will be monitored and reports will be generated.

Procedures

The registration system requires offices to reconcile attendance in order to capture accurate participation data. After each activity has been implemented, offices return to the online registration system and mark which participants attended. Reports regarding the number of participants in high-quality professional development activities will be generated. School leaders may access reports identifying the staff who attended professional development activities. Attendance data collected will inform the evaluation process.

Component 5: Evaluation

Offices are to utilize a variety of evaluation tools to measure the effectiveness of professional development offerings. This evaluation component of the Professional Development Cycle can capture both immediate, self-report feedback from participants as well as follow-up feedback gathered from participants and appropriate administrators once the new learning has been implemented. Professional development activities are to be consistently evaluated according to standardized expectations for high-quality implementation.

Purpose

The evaluation component will include multiple sources of information. Quantitative and qualitative evaluation measures focus on the identified needs, the quality of implementation of professional development activities, actual improvements in the participants' performance, the impact on student achievement, and the overall effectiveness of the systems.

Procedures

Evaluation procedures should address five critical levels of information: participants' reactions, participants' learning, organization support and change, participants' use of new knowledge and skills, and student learning outcomes (Guskey, 2000). Offices will

use the online survey tool of the Professional Development Cycle to assess the effectiveness of professional development offerings. At the conclusion of the professional development offering, participants will receive an initial survey related to the quality of implementation of the professional development activity. In addition to specific questions customized to assess the attainment of learning goals particular to a professional development session, participant surveys will include standardized response statements, such as the following:

1. The professional development made connections to my prior knowledge and experience.
2. New information was clearly presented in a manner that deepened my professional knowledge and skills.
3. The professional development activities and strategies allowed me to reflect on new learning.
4. I have a clear understanding about how to apply the new knowledge and skills in a professional setting (e.g., classroom, office).

After the professional development activity, offices may release an online survey to administrators to determine effective implementation of new learning. Offices may also release a follow-up online survey to participants to identify additional areas of need. Offices should use the survey results in conjunction with attendance reports, observation reports, and multiple measures of student achievement results to analyze the effectiveness of the professional development initiative. Executive Leadership and the Department of Professional Development review reports to evaluate the overall level of organization change and the effectiveness of the support systems and procedures for the Professional Development Cycle. (For more detailed information about the process for evaluating professional development, see Appendix I.)

SUPPORT FOR THE PROFESSIONAL DEVELOPMENT CYCLE

The effectiveness of the Professional Development Cycle is dependent upon comprehensive training for each of its users. To ensure that all users are familiar with the Guide to HQPD and fully understand each component, professional development and training are needed for all stakeholders responsible for providing professional development.

The Department of Professional Development is responsible for planning, coordinating, and facilitating training for users of the Professional Development Cycle. Professional development and training sessions are customized to support each component of the Guide to HQPD and serve as the vehicle to mobilize the plan. Support for the Professional Development Cycle is planned and structured according to national and state standards (e.g., the *National Staff Development Council's Standards for Staff Development*, the *Maryland Teacher Professional Development Standards*, and the *ISO 9001:2008 Model*) to ensure a transparent process and to benchmark the effectiveness of each component. The following professional development topics, which may include multiple sessions, will be offered as needed:

- Planning, Providing, and Evaluating High-quality Professional Development: Participants will focus on the fundamentals of high-quality professional development, the learning cycle, types of learners, learning strategies, adult-learning principles, and evaluation and assessment techniques.
- Professional Development Technical Tools: Participants will receive training in the use of the electronic tools that accompany the Professional Development Cycle.
- School-Based Pd Planning: School leadership teams will explore the dynamics of change related to creating and sustaining an effective learning community.

In addition, the Department of Professional Development will work in collaboration with the central offices to provide professional development support for schools and their development of effective learning communities. This support will focus on:

- Establishing learning communities.
- Determining the role of a learning community in a school.
- Ensuring that learning communities achieve the desired results.
- Clarifying expectations for job-embedded professional development.

Job-embedded professional learning activities may include peer review and feedback on unit plans, lessons, and assessments; collaborative analysis of student work; and action research. (McTighe, 2008) (See Appendix D for additional professional development strategies and activities.) These school-based learning opportunities will be planned, implemented, and evaluated according to the same high-quality standards described throughout the Professional Development Cycle.

GLOSSARY OF TERMS

Alignment. The effort to ensure that professional development objectives are aligned with system priorities.

Assessment. Measuring the learning and performance of students.

Attendance reconciliation. An electronic process that allows offices to capture accurate participation data to inform the evaluation process.

Blueprint for Progress. The foundational document that outlines the vision, mission, belief statements, performance goals, performance indicators, and key strategies of the Baltimore County Public Schools.

Guide to High-Quality Professional Development. The guiding document for the systemic processes and procedures to guide the planning, implementation, and evaluation of professional development initiatives.

Data analysis. The process for reasoning and making decisions based on organized factual information.

Evaluation. The process used to determine the effectiveness of a program.

High-quality professional development. Learning opportunities that deepen professionals' knowledge and skills, apply research to decision making, provide for professional collaboration and data analysis, address diverse learning needs, and evaluate changes in participant behavior and student performance.

Implementation. The second phase in the change process that provides ongoing support for the realization of an application, or execution of a plan, idea, model, design, specification, or standard.

Initiation. The first phase in the change process that introduces the plan, idea, model, design, specification, or standard. The pilot program is included in this phase.

Institutionalization. The third phase in the change process that provides embedded practice and evaluative review to establish norms within the school system.

Learning Community. A group of individuals who have common beliefs and values. These people learn from one another and with one another and are focused on achieving a common goal.

Needs assessment. A systemic examination of system-level and school-based data sources to identify student achievement gaps and priority needs.

Outcome. Something brought about by a cause; result.

Professional Development Cycle. A process that begins with a review of student achievement data, the needs of diverse learners, and input from stakeholders and is used to prioritize, plan, deliver, and evaluate high-quality professional development. This cycle includes five technology-based organizational components: (1) Needs Assessment, (2) Professional Development Year-at-a-Glance, (3) Activity and Calendar Development, (4) Registration and Attendance Reconciliation, (5) Evaluation.

BIBLIOGRAPHY

- About Learning. 4MAT: Taking instruction to a new level. Retrieved May 16, 2008 from <http://www.aboutlearning.com/>
- Bellanca, J. (1995). *Designing professional development for change*. Arlington Heights, IL: Skylight Training and Publishing Company.
- Burke, W. (1987). *Organization development*. Reading, MA: Addison-Wesley Publishing Company, Inc.
- Caldwell, S., editor. (1997). *Professional development in learning-centered schools*. Oxford, OH: National Staff Development Council.
- Eaker, R. & DuFour, R. (1998). *Professional learning communities at work*. Bloomington, IN: National Educational Service.
- Fullan, M. (2007). *The new meaning of educational change*. New York, NY: Teachers College Press.
- Gusky, T. (2000). *Evaluating professional development*. Thousand Oaks, CA: Corwin Press, Inc.
- Killion, J. & Harrison, C. (2006). *Taking the lead: New roles for teachers and school-based coaches*. Oxford, OH: National Staff Development Council.
- Knowles, M. S., Holton, E. F., Swanson, R. A. (2005). *The adult learner, sixth edition: The definitive classic in adult education and human resource development*. Burlington, MA: Elsevier, Inc.
- Lambert, L. (2003). *Leadership capacity for lasting school improvement*. Alexandria, VA: Association for Supervision and Curriculum Development.
- Learning Point Associates. (2004). *Guide to using data in school improvement efforts*. Retrieved May 16, 2008 from www.learningpt.org
- Maryland State Department of Education. (2007). *Maryland teacher professional development planning guide*. Retrieved May 16, 2008 from <http://www.marylandpublicschools.org>
- Maryland State Department of Education. (2002). *Putting it together: A handbook on planning and the matrix*. Achievement Initiative for Maryland's Minority Students.
- McTighe, J. (2008, May). Making the most of professional learning communities. *The Learning Principal*, 3 (8), 1, 4-7.

Phi Delta Kappa International. (2007). *A curriculum management audit of the Baltimore County Public School District*. Bloomington, IN: International Curriculum Management Audit Center.

Preuss, P. (2003). *School leader's guide to root cause analysis: Using data to dissolve problems*. Larchmont, NY: Eye On Education, Inc.

Sparks, D. (2002). *Designing powerful professional development for teachers and principals*. Oxford, OH: National Staff Development Council.

Zepeda, S. (2008). *Professional development: What works*. Larchmont, NY: Eye On Education, Inc.

APPENDICES

[Appendix A: Data-Driven Decision Making for Planning Professional Development](#)

[Appendix B: Professional Development Year-at-a-Glance Form](#)

[Appendix C: Professional Development Year-at-a-Glance Rubric](#)

[Appendix D: Matrix of Professional Development Strategies and Activities](#)

[Appendix E: Matrix of Hybrid, Online, and Video-Based Delivery Methods](#)

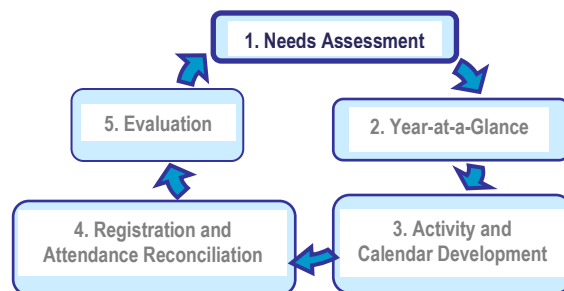
[Appendix F: Adult-Learning Principles and Strategies](#)

[Appendix G: Maryland Teacher Professional Development Standards](#)

[Appendix H: Guide for Professional Development for New/Revised Curriculum
Implementation and Support](#)

[Appendix I: Evaluating Professional Development](#)

Appendix A: Data-Driven Decision Making for Planning Professional Development



Objective: Participants will be able to analyze data in order to make decisions concerning professional development strategies, activities, and initiatives. Upon completion of the needs assessment, participants will identify what professional development on essential knowledge, skills, and strategies is needed for specific audience(s).

Example:

Based on HSA data, professional development on academic rigor is needed for department chairs, teachers, and resource personnel at targeted secondary schools.

STEP 1: Determine necessary data.

STEP 2: Look for patterns and trends.

STEP 3: Triangulate the data.

STEP 4: Identify system’s opportunities for growth and next steps.

STEP 5: Identify priority professional development needs.

STEP 6: Identify existing systemwide professional development initiatives.

STEP 7: Consider what we need to do differently and determine professional development topics.

STEP 8: Identify the appropriate audience(s).

Bibliography

- Bernhardt, V. (2003). *Using data to improve student learning*. Larchmont, NY: Eye On Education, Inc.
- Holcomb, E. (1999). *Getting excited about data: How to combine people, passion, and proof*. Thousand Oaks, CA: Corwin Press, Inc.
- Learning Point Associates. (2004). *Guide to using data in school improvement efforts*. Retrieved May 16, 2008 from www.learningpt.org
- Preuss, P. (2003). *School leader’s guide to root cause analysis: Using data to dissolve problems*. Larchmont, NY: Eye On Education, Inc.
- Thomas, R. (2006) How Grasonville Elementary School is Getting the Most from Its Data. Center for Leadership in Education at Towson University. Maryland Assessment Group Conference, November 16, 2006.

Data Response Sheet

STEP 1: Determine necessary data.

DATA QUESTIONS	RESPONSES
What data are needed to make professional development decisions?	
What is the purpose of each data set?	

STEP 2: Look for patterns and trends in data.

DATA QUESTIONS	RESPONSES
What are the patterns and trends in the HSA data? The graduation rate/dropout data? The suspension data? The schools in Improvement?	

STEP 3: Triangulate the data.

DATA QUESTIONS	RESPONSES
Draw conclusions from multiple sources.	
What are the areas of strength and/or areas of weakness across multiple data sets?	

STEP 4: Identify system’s opportunities for growth and next steps.

DATA QUESTIONS	RESPONSES
<p>What are the system’s priorities at the high school level? What does the system say about our opportunities for growth? What does the system identify as our next steps?</p>	

STEP 5: Identify priority professional development needs.

DATA QUESTIONS	RESPONSES
<p>What are the professional development needs of the system?</p>	

STEP 6: Identify existing professional development initiatives?

DATA QUESTIONS	RESPONSES
<p>What are we already doing to address professional development needs of the system?</p>	

STEP 7: Consider what we need to do differently and determine professional development topics.

DATA QUESTIONS	RESPONSES
<p>What are the current gaps between existing initiatives and the system’s identified needs?</p>	
<p>What do we need to do differently?</p>	
<p>What professional knowledge, skills, and strategies will address priority needs and root causes?</p>	

STEP 8: Identify the appropriate audience(s).

DATA QUESTIONS	RESPONSES
<p>Consider:</p> <ul style="list-style-type: none"> • Position • Geographic location • Grade level • Level of experience 	
<p>Consider other targeted priorities.</p>	

Identifying Professional Development Needs

Based on data, identify what professional development on essential knowledge, skills, and strategies is needed for specific audience(s). Include this information in your Professional Development Year-at-a-Glance (Component 2 of the Professional Development Cycle).

Appendix B: Professional Development Year-at-a-Glance Form

INITIATIVE*	IDENTIFIED NEED(S) Cite: <ul style="list-style-type: none"> • Data Source(s) • <i>Blueprint for Progress</i> Goal 	DESCRIPTION OF PROFESSIONAL DEVELOPMENT <ul style="list-style-type: none"> • PD Objective • Delivery Method(s) • Audience(s) 	TIME FRAME MM/YY – MM/YY	EXPECTED RESULTS <ul style="list-style-type: none"> • What will be different as a result of this professional development? • How will the results be measured? 	PERSON(S) RESPONSIBLE <ul style="list-style-type: none"> • Name • Position 	FUNDING SOURCE

*Offices will be prompted to indicate curriculum-related initiatives.

Appendix C: Professional Development Year-at-a-Glance Rubric

Professional Development Year-at-a-Glance Rubric	Excellent	Satisfactory	Unsatisfactory
Alignment with the <i>Blueprint for Progress</i> and system priorities	The proposed professional development connects to the appropriate system priorities* in a meaningful way. Each professional development initiative aligns with a goal from the BCPS <i>Blueprint for Progress</i> .	The proposed professional development somewhat connects to the system priorities*. Alignment with the BCPS <i>Blueprint for Progress</i> requires further explanation.	The proposed professional development fails to connect to the system priorities* or align with the BCPS <i>Blueprint for Progress</i> .
Clear alignment among the identified needs, description of professional development, and expected results	Each initiative relates to an identified need. The description specifies the professional development objective, the delivery methods, and the audience(s). The described professional development clearly responds to the identified need and will likely contribute towards the expected results. Multiple initiatives may relate to the same need and contribute towards the same expected results.	Each initiative relates to an identified need for which the data source is cited. The description of professional development requires additional specificity. The described professional development clearly responds to the identified need and will likely contribute towards the expected results.	The Professional Development Year-at-a-Glance does not adequately define the identified need. The description of professional development requires additional specificity. The relationship among the description of professional development, the identified need, and the expected results is unclear.
Inclusion of all targeted audiences	The professional development description includes learning opportunities for each targeted audience. The proposed delivery methods are differentiated according to the participants' needs. A variety of methods are provided for participants to access information.	The professional development description includes an adequate number of learning opportunities for each targeted audience. The delivery methods lack appropriate differentiation to address participants' needs and access to information.	The description outlines an inadequate number of learning opportunities for targeted audiences. The delivery methods lack appropriate differentiation.
Identification of key personnel and budget implications	Key personnel are identified. If contacted, the identified personnel will be able to address specific questions related to the initiative. The funding source is identified.	Key personnel are identified by name. The funding source is identified.	The listing of key personnel is questionable. The funding source is unclear.
Overall feasibility	After reviewing offices' Year-at-a-Glance submissions, executive leadership and the Department of Professional Development ascertain that certain audiences are not over-identified to participate in professional development initiatives. The projected time frame, expected results, professional development objectives, and delivery methods appear reasonable.	Either the projected time frame, expected results, number of professional development opportunities, or delivery methods appear to be questionable.	The projected time frame, expected results, number of professional development opportunities, and/or delivery methods appear to be unrealistic.

Appendix D: Matrix of Professional Development Strategies and Activities

Strategy/Activity	Description	Resources and Research
Action research	Action research is a deliberate, solution-oriented investigation that is collectively or individually and conducted. It is characterized by spiraling cycles of problem identification, systematic data collection, reflection, analysis, data-driven action taken, and, finally, problem redefinition.	<p>Bonner, P. J. (2006). Transformation of teacher attitude and approach to math instruction through collaborative action research. <i>Teacher Education Quarterly</i>. 33 (3), 27-44. Document URL: http://proquest.umi.com/pqdweb?did=1101401551&Fmt=3&clientId=1585&RQT=309&VName=PQD</p> <p>Kremenitzer, J. P., & Myler, T. (2006). Collaboration between teacher educator and kindergarten teacher: A 4-year action research study to improve our own professional practices. <i>Childhood Education</i>. 82 (3), 165-170. Document URL: http://proquest.umi.com/pqdweb?did=1020050511&Fmt=4&clientId=1585&RQT=309&VName=PQD</p> <p>Nickles, G. (2007) Using work action analysis to identify web-portal requirements for a professional development program. <i>International Journal on ELearning</i>. 6 (4), 565-580. Document URL: http://proquest.umi.com/pqdweb?did=1381120181&Fmt=4&clientId=1585&RQT=309&VName=PQD</p>
Book study	The purpose of book studies as a professional development tool is to promote a deeper understanding of the material being considered. The emphasis in book studies is on shared meaning by means of critical analysis and dialogue.	<p>Holler, E. W., Callender, S., & Skinner, C. (2007). Time well spent. <i>Principal Leadership</i>. (Middle Level Ed.). 7 (9), 42-46. Document URL: http://proquest.umi.com/pqdweb?did=1277145471&Fmt=3&clientId=1585&RQT=309&VName=PQD</p>
School/ classroom visitation	The observation and assessment of classroom teaching can benefit both involved parties – the teacher being observed and the observer. The teacher benefits by another’s view of his or her behavior and by receiving helpful feedback from a colleague. The observer benefits by watching a colleague, preparing the feedback, and discussing the common experience.	<p>Beers, B. (2004). Who is learning? <i>Principal Leadership</i>. (High School Ed.). 4 (9), 28-33. Document URL: http://proquest.umi.com/pqdweb?did=637480811&Fmt=4&clientId=1585&RQT=309&VName=PQD</p> <p>Ivason-Jansson, E., & Gu, L. (2006). Reflection and professional learning: An analysis of teachers’ classroom observations. <i>Thinking Classroom</i>. 7 (1), 4-10. Document URL: http://proquest.umi.com/pqdweb?did=1118040461&Fmt=3&clientId=1585&RQT=309&VName=PQD</p> <p>Schomburg, G. (2006). Superintendent in the classroom. <i>Phi Delta Kappan</i>. 87 (7), 546-550. Document URL: http://proquest.umi.com/pqdweb?did=1070952331&Fmt=3&clientId=1585&RQT=309&VName=PQD</p> <p>Tuska, A. (2006). Lesson study: A student-centered professional development opportunity for teachers <i>Thinking Classroom</i>. 7 (1), 26-29. Document URL: http://proquest.umi.com/pqdweb?did=1118040491&Fmt=3&clientId=1585&RQT=309&VName=PQD</p>

Guide to High-Quality Professional Development for Baltimore County Public Schools

Strategy/Activity	Description	Resources and Research
Curriculum development	Curriculum development refers to the development of classroom-ready instructional materials based on the needs of students.	Penuel, W. R., Fishman, B. J., Yamaguchi, R., & Gallagher, L. P. (2007). What makes professional development effective? Strategies that foster curriculum implementation. <i>American Educational Research Journal</i> . 44 (4), 921-958. Document URL: http://proquest.umi.com/pqdweb?did=1393979981&Fmt=3&clientId=1585&RQT=309&VName=PQD
Conferences	A conference is a forum where work is presented in the form of short, concise presentations. Often there are one or more keynote speakers. Panel discussions, roundtables on various issues, and workshops may be part of the conference.	Bradburn, F. B. (2004). Tweaking common professional development models for added value. <i>T.H.E. Journal</i> . 31 (12), 26-28 . Document URL: http://proquest.umi.com/pqdweb?did=670590021&Fmt=4&clientId=1585&RQT=309&VName=PQD Jakes, D. (2006). Staff development 2.0. <i>Technology & Learning</i> . 26 (10), 20-24. Document URL: http://proquest.umi.com/pqdweb?did=1042700621&Fmt=4&clientId=1585&RQT=309&VName=PQD
Curriculum mapping	Curriculum mapping is a tool for gathering data on what teachers are actually working on with their students through the course of the school year. When a school undertakes curriculum mapping, all teachers at the school enter information about their classroom curricula into a computer database that is geared to the school calendar. Teachers enter three types of data: content (key concepts, essential questions); specific skills (often based on state standards); and assessments (tests, products, or performances). Unlike curriculum guidelines, which target goals to inform practice, mapping displays the actual time it takes to implement curriculum depending on the pacing needs of students.	DeClark, T. (2002). Curriculum mapping: A how-to-guide. <i>The Science Teacher</i> . 69 (4), 29-31. Document URL: http://proquest.umi.com/pqdweb?did=1169101198&Fmt=6&clientId=1585&RQT=309&VName=PQD Jacobs, H. H. (2000). Upgrading the k-12 journey through curriculum mapping. <i>Knowledge Quest</i> . 29 (2), 25. Document URL: http://proquest.umi.com/pqdweb?did=65301090&Fmt=3&clientId=1585&RQT=309&VName=PQD
Curriculum symposium	A curriculum symposium is an event for the discussion of a curriculum during which participants generally make presentations.	Roberg, E. (2004). Beginning the year with a symposium. <i>The Science Teacher</i> . 71 (7), 59-60. Document URL: http://proquest.umi.com/pqdweb?did=679636861&Fmt=6&clientId=1585&RQT=309&VName=PQD

Guide to High-Quality Professional Development for Baltimore County Public Schools

Strategy/Activity	Description	Resources and Research
Data analysis	Data analysis is the process of looking at and summarizing data with the intent to extract useful information and develop conclusions.	Lachat, M. A., Williams, M., & Smith, S. C. (2006) Making sense of ALL your data. <i>Principal Leadership</i> . (Middle Level Ed.). 7 (2), 16-21. Document URL: http://proquest.umi.com/pqdweb?did=1152250201&Fmt=3&clientId=1585&RQT=309&VName=PQD
Data dialogues	Data dialogues include the collaborative analysis and discussion of data for instructional decision-making purposes.	Bernstein, A. (2006). Using data to upend conventional wisdom. <i>Principal Leadership</i> . (High School Ed.). 7 (2), 32-36. Document URL: http://proquest.umi.com/pqdweb?did=1146402331&Fmt=3&clientId=1585&RQT=309&VName=PQD Lachat, M. A., Williams, M., & Smith, S. C. (2006) Making sense of ALL your data. <i>Principal Leadership</i> . (Middle Level Ed.). 7 (2) 16-21. Document URL: http://proquest.umi.com/pqdweb?did=1152250201&Fmt=3&clientId=1585&RQT=309&Vname=PQD Skretta, J. (2007). Using walk-throughs to gather data for school improvement. <i>Principal Leadership</i> . (Middle Level Ed.). 7 (9), 16-23. Document URL: http://proquest.umi.com/pqdweb?did=1277145431&Fmt=3&clientId=1585&RQT=309&Vname=PQD
Developing individual growth plans	To develop an individual growth plan, educators formulate questions they would like to pursue, develop an individual learning plan centered on their guiding questions, execute the learning plan, document accomplishments, assess the effectiveness of the plan, reflect on their learning process, and repeat the process.	Karnes, F. A., & Shaunessy, E. (2004). The application of an individual professional development plan to gifted education. <i>Gifted Child Today</i> . 27 (3), 60-64. Document URL: http://proquest.umi.com/pqdweb?did=670594861&Fmt=4&clientId=1585&RQT=309&VName=PQD
Journaling	A reflective journal entry is designed to allow teachers to express what they learned from a clinical experience.	Stewart, C., & Chance, L. (1995). Making connections: Journal writing and the professional teaching standard. <i>The Mathematics Teacher</i> . 88 (2), 92-95. Document URL: http://proquest.umi.com/pqdweb?did=1867779&Fmt=6&clientId=1585&RQT=309&VName=PQD Uline, C., Wilson, J. D., & Sheila Cordry. (2004). Reflective journals: A valuable tool for teacher preparation. <i>Education</i> . 124 (3), 456-460. Document URL: http://proquest.umi.com/pqdweb?did=642068591&Fmt=4&clientId=1585&RQT=309&VName=PQD

Guide to High-Quality Professional Development for Baltimore County Public Schools

Strategy/Activity	Description	Resources and Research
Lesson study	In lesson study, a group of teachers develops a lesson together; one of them teaches the lesson while the others observe the student learning. The entire group comes together to debrief the lesson and often revises and reteaches the lesson to incorporate what has been learned.	Panasuk, R. M., & Sullivan, M. M. (1998). Need for lesson analysis in effective lesson planning. <i>Education</i> . 118 (3), 330-344. Document URL: http://proquest.umi.com/pqdweb?did=28580723&Fmt=4&clientId=1585&RQT=309&VName=PQD
Mentoring	There are two types of mentoring relationships: formal and informal. Informal relationships develop on their own between partners. Formal mentoring refers to assigned relationships, often associated with organizational mentoring programs designed to promote teacher development.	Lach, M., & Goodwin, D. (2002). Everyone needs a mentor. <i>The Science Teacher</i> . 69 (6), 50-52. Document URL: http://proquest.umi.com/pqdweb?did=158485151&Fmt=6&clientId=1585&RQT=309&VName=PQD Musanti, S. (2004). Balancing mentoring and collaboration: Midcareer teachers constructing a new role. <i>Curriculum and Teaching Dialogue</i> . 6 (1), 13-23. Document URL: http://proquest.umi.com/pqdweb?did=783368351&Fmt=4&clientId=1585&RQT=309&VName=PQD
Online PD programs	A form of computer-based training in which course material is accessed on an intranet or Internet and may be linked to learning resources outside of the course. For example, there may be links to references, e-mail, discussions, and videoconferencing. A record of work completed by each learner may also be saved on the server offering the course.	George, M. (2007). Online-learning communities: the next generation of professional development. <i>MultiMedia & Internet@Schools</i> . 14 (6), 14-17. Document URL: http://proquest.umi.com/pqdweb?did=1381891821&Fmt=3&clientId=1585&RQT=309&VName=PQD Sprague, D. (2007). Online professional development for teachers: emerging models and methods. <i>Journal of Technology and Teacher Education</i> . 15 (1), 145-149. Document URL: http://proquest.umi.com/pqdweb?did=1184989891&Fmt=3&clientId=1585&RQT=309&VName=PQD
Peer coaching	Peer coaching provides participants opportunities to be observed, to observe, and to discuss practices.	Pierce, D., & Hunsaker, T. W. (1996). Professional development for the teacher, of the teacher, and by the teacher. <i>Education</i> . 117 (1), 101-105. Document URL: http://proquest.umi.com/pqdweb?did=10425987&Fmt=4&clientId=1585&RQT=309&VName=PQD Showers, B., & Bruce, J. (1996). The evolution of peer coaching. <i>Educational Leadership</i> . 53 (6), 12-16. Document URL: http://proquest.umi.com/pqdweb?did=9344862&Fmt=3&clientId=1585&RQT=309&VName=PQD
Podcasting	A podcast is a series of digital-media files which are distributed over the Internet using syndication feeds for playback on portable media players and computers.	Hazard, B. (2007, June 11). Podcasting and professional development: How podcasting forms more questions than answers for educators. Posted to <i>Teaching Big 6, E-Newsletter</i> http://www.big6.com/2007/06/11/podcasting-and-professional-development-how-podcasting-forms-more-questions-than-answers-for-educators/ Yerrick, R. (2006, October 19). Globalizing education one podcast at a time. <i>T.H.E. Journal</i> . http://www.thejournal.com/the/newsletters/smartclassroom/archives/?aid=19444

Guide to High-Quality Professional Development for Baltimore County Public Schools

Strategy/Activity	Description	Resources and Research
Postgraduate courses	Postgraduate coursework is study undertaken after at least three years of undergraduate studies.	<p>Topper, A. (2004). How are we doing? Using self-assessment to measure changing teacher technology literacy within a graduate educational technology program. <i>Journal of Technology and Teacher Education</i>. 12 (3), 303-317. Document URL: http://proquest.umi.com/pqdweb?did=757578771&Fmt=4&clientId=1585&RQT=309&VName=PQD</p>
Professional development resources	<p>Professional development resources are available in a variety of media formats, including:</p> <ul style="list-style-type: none"> • Traditional print magazines, journals, and newsletters, such as Phi Delta Kappan and Scholastic's Instructor. • Educational Web sites, such as EducationWorld and Discovery School. • E-newsletters, such as Riverdeep's Classroom Flyer and Education World's Teacher Lesson Plans. • E-mail lists or listservs, such as EdTech and TechTrainers. • Real-time chats or discussions, such TappedIn and TeacherTalk. • District- or school-based materials, including handouts, newsletters, e-mails. 	<p>Hunt, B. (2005). A new teacher's guide to professional development. <i>English Journal</i>. (High School Edition). 95 (2), 101-104. Document URL: http://proquest.umi.com/pqdweb?did=943875231&Fmt=4&clientId=1585&RQT=309&Vname=PQD</p> <p>McGlenn, J. M., Calvert, L. G., & Johnson, P. S. (2003). University-school connection: A reading circle for teachers. <i>The Clearing House</i>. 77 (2), 44-49. Document URL: http://proquest.umi.com/pqdweb?did=593981881&Fmt=4&clientId=1585&RQT=309&Vname=PQD</p>
Professional organizations	A professional organization, also known as a professional association is an organization, usually nonprofit, that exists to further a particular profession, to protect both the public interest and the interests of professionals.	<p>Evans, R. W., & Passe, J. (2007). Dare we make peace: A dialogue on the social studies wars. <i>The Social Studies</i>. 98 (6), 251-256. Document URL: http://proquest.umi.com/pqdweb?did=1396482961&Fmt=3&clientId=1585&RQT=309&VName=PQD</p>

Guide to High-Quality Professional Development for Baltimore County Public Schools

Strategy/Activity	Description	Resources and Research
Professional portfolios	A professional teaching portfolio is a collection of artifacts designed to demonstrate mastery of a set of professionally accepted standards.	<p>Anderson, M. A. (2005). Yes! You should create a professional portfolio. <i>MultiMedia & Internet@Schools</i>. 12 (4), 34-36. Document URL: http://proquest.umi.com/pqdweb?did=867919551&Fmt=4&clientId=1585&RQT=309&VName=PQD</p> <p>Denzine, G. M. (2001). Making a commitment to professional growth: Realizing the potential of professional portfolios. <i>NASPA Journal</i>. 38 (4), 495-510. Document URL: http://proquest.umi.com/pqdweb?did=110109476&Fmt=4&clientId=1585&RQT=309&VName=PQD</p> <p>Wilcox, B. L. (1997). The teacher's portfolio: An essential tool for professional development. <i>The Reading Teacher</i>. 51 (2), 170-173. Document URL: http://proquest.umi.com/pqdweb?did=17540779&Fmt=4&clientId=1585&RQT=309&VName=PQD</p>
Self-reflection	Self-reflection requires: <ul style="list-style-type: none"> • A deliberate pause, a purposeful slowing down to find time for a close look. • Consciously processing one's thoughts. • Examining beliefs, goals, and practices. • Gaining new insights and understanding. 	<p>Henry, C. (1999). The role of reflection in student teachers' perceptions of their professional development. <i>Art Education</i>. 52 (2), 14-20. Document URL: http://proquest.umi.com/pqdweb?did=39473712&Fmt=4&clientId=1585&RQT=309&VName=PQD</p>
Summer institutes	A professional development event usually sponsored by an institution of higher education to bring practitioners together to study or share findings around a common body of knowledge.	<p>Basista, B., Tomlin, J., Pennington, K., & Pugh, D. (2001). Inquiry-based integrated science and mathematics professional development program. 121 (3), 615-624. Document URL: http://proquest.umi.com/pqdweb?did=73020189&Fmt=4&clientId=1585&RQT=309&VName=PQD</p> <p>Kenreich, T. W. (2004). Beliefs, classroom practices, and professional development activities of teacher consultants. <i>The Journal of Geography</i>. 103 (4), 153-160. Document URL: http://proquest.umi.com/pqdweb?did=712509281&Fmt=4&clientId=1585&RQT=309&VName=PQD</p> <p>Linaberger, M. (Dec 2004/Jan 2005). Poetry top 10: A foolproof formula for teaching poetry. <i>The Reading Teacher</i>. 58 (4), 366-372. Document URL: http://proquest.umi.com/pqdweb?did=771488051&Fmt=4&clientId=1585&RQT=309&VName=PQD</p> <p>Musante, S. (2005). Ceating a community of educators to improve undergraduate biology student learning. <i>Bioscience</i>. 55 (4), 309. Document URL: http://proquest.umi.com/pqdweb?did=823659411&Fmt=3&clientId=1585&RQT=309&Vname=PQD</p>

Guide to High-Quality Professional Development for Baltimore County Public Schools

Strategy/Activity	Description	Resources and Research
Study group	A study group is a small group of people who regularly meet to discuss shared fields of practice.	Peters, E. (2008). Validating assessment: Teacher study groups. <i>Science Scope</i> . 31 (5), 48-50. Document URL: http://proquest.umi.com/pqdweb?did=1459993661&Fmt=6&clientId=1585&RQT=309&VName=PQD
Wikis and blogs	Wikis and blogs are Web 2.0 tools that promote practices such as sharing thoughts and information through self-publishing and harnessing the collective intelligence of all users to generate information and solve problems.	Mills, L. B. (2007). The next wave now: Web 2.0. <i>The Education Digest</i> . 73 (4), 4-5. Document URL: http://proquest.umi.com/pqdweb?did=1404052391&Fmt=3&clientId=1585&RQT=309&VName=PQD

Appendix E: Matrix of Hybrid, Online, and Video-Based Delivery Methods

Effective professional development addressed by hybrid, online, and video-based delivery methods is:

- Informed by research on teaching and learning and provides a strong foundation in subject content and methods of teaching.
- Integrated with district goals to improve education, guided by a coherent long-term plan, and driven by disaggregated data on student outcomes.
- Designed in response to teacher-identified needs and utilizes collaborative problem solving in which colleagues assist one another by discussing dilemmas and challenges.
- Primarily school-based, provides sufficient time and other resources, and enables teachers to work with colleagues in their school building.
- Continuous and ongoing, incorporates principles of adult learning, and provides follow-up support for further learning.
- Evaluated ultimately on the basis of its impact on teacher effectiveness and student learning.

Delivery Methods	Advantages	Considerations	Online Resources
Video-conference			
Safari Montage Live!	<ul style="list-style-type: none"> • Provides model(s) of effective pedagogy using distance learning technology. • Can be responsive to changing variables and instantly refined to meet needs. • Facilitates interaction and dialogue among participants. • Supports interaction with both content and colleagues. • Allows teachers to easily and inexpensively tap into expertise of experts both in and outside of the district. • Increases individual teacher knowledge, competence and skills. • Maximizes time and minimizes travel. • Reaches practitioners who find it difficult to attend face-to-face PD. • Has the ability to record and archive discussions for teacher review or initial viewing for teachers who could not attend the live conferencing. • Provides training in and hands-on application of technology. 	<p>Prerequisite Skills and Equipment</p> <ul style="list-style-type: none"> • Safari Montage Live! Quick Start Guide • Safari Montage Live! User Manual • Additional Quick Start Guides Planning Guide Checklist and Timeline • Preliminary Planning • Preparing the Professional Development <ul style="list-style-type: none"> ○ Instructional Strategies • During the Videoconference <ul style="list-style-type: none"> ○ Guide to Your Role as Facilitator • Post-videoconference Evaluations: <ul style="list-style-type: none"> ○ Instructor ○ Participant • Learning and Reflection Log 	<p>Safari Montage Live! Portal</p> <p>Research:</p> <ul style="list-style-type: none"> • The Effectiveness of Interactive Distance Education Technologies in K-12 Learning: A Meta-Analysis • Interactive Videoconferencing as a Medium for Special Education: Knowledge Acquisition in Preservice Teacher Education • The Virtual Scientist: Connecting University Scientists to the K-12 Classroom through Videoconferencing • Take a Field Trip Without Leaving the Classroom: Museums, Zoos, and Interactive Videoconferencing • Integrating Visual Literacy • Conceptual and Socio-Cognitive Support for Collaborative Learning in Videoconferencing Environments

Guide to High-Quality Professional Development for Baltimore County Public Schools

Delivery Methods	Advantages	Considerations	Online Resources
			<ul style="list-style-type: none"> • iChat[™] Do You? Using Desktop Web Conferencing in Education • Investigating Cooperation and Collaboration in near Synchronous Computer Mediated Conferences • Distance Learning: It's Elementary! • Computer Conferencing and the Development of Habits of Mind Associated with Effective Teacher Education
Elluminate!	<ul style="list-style-type: none"> • Can be responsive to changing variables and instantly refined to meet needs. • Facilitates interaction and dialogue among participants. • Supports interaction with both content and colleagues. • Allows teachers to easily and inexpensively tap into expertise of experts both in and outside of the district. • Increases individual teacher knowledge, competence and skills. • Maximizes time and minimizes travel. • Reaches practitioners who find it difficult to attend face-to-face PD. • Has the ability to archive discussions and access additional resources. • Provides training in and hands-on application of technology. 	Contact the Office of Instructional Technology for more information.	Resources on how to use Elluminate Resource Guide for Participants Elluminate Live!® V8 Training and Documentation for Moderators
Video			
School-produced	<ul style="list-style-type: none"> • Provides model(s) of effective pedagogy. • Provides opportunities to tap local school expertise of over 50 TV studio producers in the production of professional development resources. • Increases individual teacher knowledge, competence, and skills. 	Requires school-based TV studio facility or less expensive TV Studio2Go mobile facility.	Center for Media Literacy Collaborating to Create Media-Savvy Young People Confronting the Challenges of Participatory Culture: Media Education for the 21st Century (MIT)

Guide to High-Quality Professional Development for Baltimore County Public Schools

Delivery Methods	Advantages	Considerations	Online Resources
	<ul style="list-style-type: none"> Maximizes time and minimizes travel. Can be copied to DVD and/or archived to Safari Montage WAN server for district-wide sharing. 		How People Learn Computers in Education, A Brief History Making Thinking Visible (MTV)
Education Channel	<ul style="list-style-type: none"> Provides model(s) of effective pedagogy. Increases individual teacher knowledge, competence and skills. Maximizes time and minimizes travel. Reaches practitioners who find it difficult to attend face-to-face PD. Can be copied to DVD and/or archived to Safari Montage WAN server for district-wide sharing. 	Education Channel Request Form Video by Thinkport: Using Media Effectively for your Classroom	
Podcast	<ul style="list-style-type: none"> Delivers “just-in-time” mobile professional development. Opportunity to develop a podcast portal of professional development resources, as well as access authoritative podcasts of other professional organizations. Can be responsive to changing variables and instantly refined to meet needs. Allows teachers to easily and inexpensively tap into expertise of experts both in and outside of the district. Increases individual teacher knowledge, competence and skills. Maximizes time and minimizes travel. Reaches practitioners who find it difficult to attend face-to-face PD. Has the ability to archive discussions and access additional resources. 	How to Create Your First Podcast How to Create Your Own Podcast - A Step-by-Step Tutorial Equipment requirements to record podcast: <ul style="list-style-type: none"> PC with a Pentium 4 or equivalent processor with 512 MB of RAM, 3 to 4 GB of available space on hard drive and an audio port for line in and line out. Winamp. Mixcast Live or Audacity. FTP utility. Professional microphone and headset. 	Best Practices: Staff Development on the Go Producing a Podcast with the Gear You Own Today
Webcast	<ul style="list-style-type: none"> Provides model(s) of effective pedagogy. Can be responsive to changing variables and instantly refined to meet needs. Allows teachers to easily and inexpensively tap into expertise of experts both in and outside of the district. 	Webcast Request Form	Sample Webcasts from MCPS

Guide to High-Quality Professional Development for Baltimore County Public Schools

Delivery Methods	Advantages	Considerations	Online Resources
	<ul style="list-style-type: none"> Increases individual teacher knowledge, competence and skills. Maximizes time and minimizes travel. Reaches practitioners who find it difficult to attend face-to-face PD. Has the ability to archive discussions and access additional resources. Provides training in and hands-on application of technology. 		
Online course			
Desire2Learn	<ul style="list-style-type: none"> Increases individual teacher knowledge, competence and skills. Maximizes time and minimizes travel. Reaches practitioners who find it difficult to attend face-to-face PD. Has the ability to archive discussions and access additional resources. 	<p>Requires successful completion of Successful Online Facilitating Techniques (SOFT) Course; contact the Office of Instructional Technology for details.</p> <p>Guidelines for the Implementation of e-Communities</p> <ul style="list-style-type: none"> Optimizing the Set-up of an e-Community, BCPS handout and website (username and password: summit.guest) Tips and Tricks for Successful Implementation, BCPS handout 	Developing an Effective Online Course
Webinar	<ul style="list-style-type: none"> Provides model(s) of effective pedagogy. Can be responsive to changing variables and instantly refined to meet needs. Allows teachers to easily and inexpensively tap into expertise of experts both in and outside of the district. Increases individual teacher knowledge, competence and skills. Maximizes time and minimizes travel. 	<p>Webinar Request Form</p> <p>Equipment requirements:</p> <ul style="list-style-type: none"> Professional microphone and headset Webcam 	<p>Research:</p> <ul style="list-style-type: none"> Webinar: Best Practices White Paper Best Practices for a Successful Webinar

Guide to High-Quality Professional Development for Baltimore County Public Schools

Delivery Methods	Advantages	Considerations	Online Resources
	<ul style="list-style-type: none"> • Reaches practitioners who find it difficult to attend face-to-face PD. • Has the ability to archive discussions and access additional resources. • Provides training in and hands-on application of technology. 		
Online Community			
e-Community	<ul style="list-style-type: none"> • Engages teachers in a collegial and collaborative dialogue. • Is interactive, continuous, reflective and job-embedded. • Provides file storage space for document archiving and exchange, hypertext linking to additional digital learning resources, e.g., Web sites, podcasts, RS feeds, etc. • Is easy and intuitive for teacher adoption and use with WSIWG Web 2 tools. • Provides a safe, supportive learning environment anytime and anywhere. 	Guidelines for the Implementation of e-Communities Presentations: <ul style="list-style-type: none"> • Sustaining Multiple e-Communities, BCPS • Maintaining Participation through Structure and Facilitation, EdTech Leaders Online • Keep Them Participating, Really!, BCPS 	Promoting a Sense of Community
Study circle	<ul style="list-style-type: none"> • Provides a safe, supportive learning environment. • Encourages teachers from the same school, or content area to participate together. • Incorporates research-based professional development practices. • Is inexpensive. • Supports development of content and technical expertise both within the context of study-group activities and through the collegial support relationships. 	Equipment Requirements: <ul style="list-style-type: none"> • Computer with Internet access • BCPS e-mail account Tips: <ul style="list-style-type: none"> • Identify a topic of true relevance. • Enlist the aid of qualified and effective facilitators. • Ensure a positive and productive process by positively reinforcing participants early and often. • Integrate study groups into a larger, schoolwide vision of 	Research: Study Groups and Webquests

Guide to High-Quality Professional Development for Baltimore County Public Schools

Delivery Methods	Advantages	Considerations	Online Resources
		professional growth. <ul style="list-style-type: none"> Evaluate level of participation and quality of discussions on a quarterly basis. 	
Wiki	<ul style="list-style-type: none"> Enables remote collaborative knowledge creation using a “document-space model” rather than a “document sharing” of multiple versions of documents residing on individual computer workstations. Increases innovation and creativity through use of document-space models. Creates a database for creating, browsing, and searching through information. Is easy and intuitive for teacher adoption and use with WSIWG Web 2 tools. 	Requires computer with Internet access.	Ways to Use Wiki in Education Wikis in Education Case Study Using Wiki in Education
Blog	<ul style="list-style-type: none"> Builds reflective practice. Creates a database for creating, browsing, and searching through information. Is easy and intuitive for teacher adoption and use with WSIWG Web 2 tools. 	Requires computer with Internet access. WordPress or Edublog	WordPress Support An Introduction to Using Edublogs Writing Posts and Pages Picture Perfect Presentations
Online workgroup	<ul style="list-style-type: none"> Facilitates synchronous (real-time) and asynchronous communication, coordination, and collaboration among groups of people. Engages teachers in a collegial and collaborative dialogue. Is interactive, continuous, reflective, and job-embedded. Provides file storage space for document archiving and exchange, and hypertext linking to additional digital learning resources, e.g., Web sites, podcasts, RS feeds, etc. Is easy and intuitive for teacher adoption and use with WSIWG Web 2 tools. Provides a safe, supportive learning environment anytime and anywhere. 	Requires computer with Internet access. Collective X	

Appendix F: Adult-Learning Principles and Strategies

Principle (adapted from Knowles, ET AL 2005)	Strategies	Examples	
		System-level	School-level
Adults need to know the purpose for learning something before they begin to learn it.	<ul style="list-style-type: none"> • Help learners become aware of the need to know. • Provide real or simulated experiences in which the learners discover for themselves the gaps between where they are now and where they want to be. • Elicit and clarify the purposes of the individuals as well as the more general purposes of the group. • Ensure that all professional development activities are part of the big picture, but tailored to meet individual participants' needs. 	Couple systemwide goals with individual learning goals. Use available data to learn about professional needs. Incorporate a self-reflection component that compares current practice and results with desired expectations.	Couple school improvement goals with individual learning goals. Incorporate data analysis and data dialogues.
Adults have a self-concept of being responsible for their own decisions.	<ul style="list-style-type: none"> • Create learning experiences in which adults are helped to make the transition from dependent to self-directing learners. • Give learners some responsibility in choosing methods and resources. • Involve participants in evaluating their own learning. • Involve learners in developing and applying procedures and criteria for self-evaluation. • Use participants' work samples or student work samples to help professionals learn from the everyday work that they do. • Facilitate participants' ability to critically assess their practices and adjust subsequent actions to take these insights into account. 	Ask critical, content-specific questions to promote collective inquiry and allow participants to actively construct knowledge. Collectively develop a rubric depicting effective implementation.	Focus on collectively defining and modeling quality instruction, which includes improving classroom assessment, applying data to inform instruction, and employing strategies to actively engage students. Support lesson studies and Looking at Student Work groups.
Adults have a greater volume and different quality of experience from that of youths. Among groups of adults there is a wider range of individual differences, more heterogeneity, and	<ul style="list-style-type: none"> • Recognize that the richest resources for learning reside in the learners themselves. • Share your own previous experiences and lessons learned to demonstrate why you are qualified to present to them. • Tap into the experiences of learners by emphasizing experiential techniques (group discussions, simulation exercises, problem-solving activities, case methods, peer-helping activities). 	Use the 4MAT Learning Cycle; connect to participants' prior knowledge, clearly present new information, engage in interactive strategies to practice the new knowledge and skills,	Use informal/formal discussions, classroom observations, faculty surveys, and student performance data to assess needs and examine habits and biases. Identify strategies

Guide to High-Quality Professional Development for Baltimore County Public Schools

Principle (adapted from Knowles, ET AL 2005)	Strategies	Examples	
		System-level	School-level
a greater tendency to develop mental habits, biases, and presuppositions.	<ul style="list-style-type: none"> • Individualize teaching and learning strategies according to the participants' background, learning style, motivation, needs, interests, and goals. Use examples that reflect diversity in group. • Actively engage participants through multiple modalities of learning. • Accommodate heterogeneity by organizing and making available the widest possible range of resources for learning. • Help adult learners examine their habits and biases and open their minds to new approaches. 	assist participants in applying new knowledge to their work situation. Design initiatives with multiple sessions, rather than one-shot options. Provide accessible resources; consider online options or cluster according to geographic area.	to address needs. Identify and support expertise among staff to facilitate job-embedded professional development.
Adults become ready to learn content and skills in order to cope effectively with their real-life situations.	<ul style="list-style-type: none"> • Time learning experiences to coincide with related developmental tasks. Support opportunities for immediate application. • Provide follow-up support to ensure that lessons learned are transferred into practice. • Induce readiness through exposure to models of best practices, pre- and post-observation conferences, looking at student work groups, critical friends, simulation exercises. • Provide a learning community structure where professionals can find timely support. 	Connect to the participants' real work and experiences. Focus on deepening content understanding in order to address student needs. Share look-fors that describe quality implementation. Facilitate an e-Community that allows participants to share challenges and ideas.	Reinforce learning through pre- and post-conferences, classroom observations and walkthroughs. Encourage and support immediate application of learning, experimentation, and adaptation. Facilitate peer coaching for immediate feedback and co-planning for collaboration and ongoing conversation.
Adults are problem-centered in their orientation to learning.	<ul style="list-style-type: none"> • Present new knowledge, skills, values, and attitudes in the context of application to real-life situations. • Align professional development with actual classroom conditions. • Help learners identify professional problems that they experience. • Organize content around problem solving. 	Elicit from participants the challenges that they are experiencing and relate information and resources to their specific challenges. Provide a contact for ongoing assistance and trouble-shooting.	Expect interventions to be implemented and support quality implementation. Encourage risk taking and learning from mistakes. Facilitate action research on collectively identified issues.

Principle (adapted from Knowles, ET AL 2005)	Strategies	Examples	
		System-level	School-level
Adults are most responsive to internal motivators.	<ul style="list-style-type: none"> • Connect to internal pressures (the desire for increased job satisfaction, self-esteem, quality of life). • Provide a climate in which the learners feel respected, trusted, unthreatened, and cared about. • Share your feelings as a co-learner in ways that do not demand or impose. • Build relationships of mutual trust and cooperation. • Provide opportunities for reflection, collective inquiry, and collaboration. 	Consider individual participants' preferences by providing a spectrum of delivery methods: online/hybrid modules, podcasting, and webinars versus face-to-face workshops.	Know what motivates individuals. Model a proactive learning posture. Incorporate teambuilding activities for staff.

References

About Learning. 4MAT: Taking instruction to a new level. Retrieved May 16, 2008 from <http://www.aboutlearning.com/>

Caldwell, S., editor. (1997). *Professional development in learning-centered schools*. Oxford, OH: National Staff Development Council.

Eaker, R. & DuFour, R. (1998). *Professional learning communities at work*. Bloomington, IN: National Educational Service.

Killion, J. & Harrison, C. (2006). *Taking the lead: New roles for teachers and school-based coaches*. Oxford, OH: National Staff Development Council.

Knowles, M. S., Holton, E. F., Swanson, R. A. (2005). *The adult learner, sixth edition: The definitive classic in adult education and human resource development*. Burlington, MA: Elsevier, Inc.

Maryland State Department of Education. (2007). *Maryland teacher professional development planning guide*. Retrieved May 16, 2008 from <http://www.marylandpublicschools.org>

McTighe, J. (2008, May). Making the most of professional learning communities. *The Learning Principal*, 3 (8), 1, 4-7.

Sparks, D. (2002). *Designing powerful professional development for teachers and principals*. Oxford, OH: National Staff Development Council.

Zepeda, S. (2008). *Professional development: What works*. Larchmont, NY: Eye On Education, Inc.

Appendix G: Maryland Teacher Professional Development Standards

Introduction

Research, insights from practice, and common sense converge around the understanding that skilled teachers have a significant impact on student learning. Helping teachers develop the knowledge and skills they need begins with rigorous teacher training programs. Subsequently, effective professional development helps teachers continue enhancing their knowledge and skills throughout their careers.

Maryland's Teacher Professional Development Standards are intended to guide efforts to improve professional development for all teachers. These standards call on teachers, principals and other school leaders, district leaders and staff, the Maryland State Department of Education, institutions of higher education, and cultural institutions and organizations¹ across the state to work together to ensure that professional development is of the highest quality and readily accessible to all teachers. These standards also acknowledge that teacher professional development encompasses a wide variety of learning activities. The list includes, but is certainly not limited to, teacher study groups, coaching and mentoring relationships, teacher networks, participation on school improvement teams and committees that develop curricula and assessments, workshops, and college and university courses.

When fully implemented, these standards and the related indicators can help improve the quality of professional development by:

- Providing a clear vision of high-quality professional development that recognizes local needs, priorities, and resources;
- Guiding planning, designing, implementing, and evaluating high-quality professional development, including both professional development programs and an entire professional development agenda;
- Supporting alignment of professional development with goals for improving student learning and state, district, and school policies and priorities;
- Informing allocation of resources for professional development; and
- Defining accountability for ensuring that professional development is of the highest quality and readily accessible to all teachers.

Context for High-Quality Teacher Professional Development in Maryland

The Maryland Teacher Professional Development Standards are derived from the National Staff Development Council's (NSDC) Standards for Staff Development.² Like the NSDC standards, the Maryland Teacher Professional Development Standards rest on several fundamental assumptions about contextual factors that are critical to ensuring that professional development is effective.

- **Professional development is most effective when it takes place in vibrant professional learning communities.** These learning communities take various forms, but they all value ongoing learning by teachers and students. They encourage individual and collaborative experimentation, practice, and reflection. They foster collegiality and problem solving, and they emphasize continuous improvement in classrooms and schools.
- **Professional development is most effective when there are strong leaders.** These leaders recognize the value of high-quality professional development, encourage and facilitate teacher participation, and communicate about the benefits of professional development to key stakeholders (e.g., parents, school boards, county commissioners). Ideally, leadership for professional development is distributed among teachers, principals and other administrators, district staff, MSDE, and institutions of higher education, and various cultural organizations. At the same time, no single formula defines the appropriate distribution of leadership.
- **Professional development is most effective when there are adequate resources.** Resources include money, people, and time. Just as leadership should be distributed, resources (people and money) can come from a variety of sources, with no single organization or stakeholder group

expected to shoulder the whole burden. Careful analysis of how time is used in school schedules, district calendars, negotiated agreements and other policy documents can lead to more time for teacher learning. All of these resources will be used most effectively when allocations are coordinated and when there is careful assessment of the returns on investments in professional development. As with leadership, no single formula defines the adequacy of resources. Instead, resources are adequate when they ensure that all teachers can study, practice, and implement the knowledge and skills necessary to be effective with their students.

The Maryland Teacher Professional Development Standards rest on a fourth assumption which is consistent with the NSDC definition of effective professional development.

- **Professional development is most effective when there is consensus around clear expectations for what teachers should know and be able to do to help all students learn.** These expectations are shared among all stakeholders and district and school leaders work to build understanding and consensus around them. The expectations are reflected in negotiated agreements, job descriptions and assignments, performance appraisal systems, systems of rewards and incentives for teachers, and in the design and content of teacher professional development.

In the end, the formula for effectiveness is simple: When these four elements are in place, professional development can be highly effective. When they are missing or underdeveloped, professional development will not be effective and will have limited impact on teaching and learning.

¹ Cultural institutions include libraries, museums, and similar kinds of organizations.

² The NSDC standards were developed in 1995 and revised in 2001. The Maryland Teacher Professional Development Standards are derived from the 2001 version of the NSDC standards.

Standards and Indicators Define High-Quality Professional Development

Content Standards

Standard	Content knowledge and quality teaching
1	Effective professional development deepens all teachers' content knowledge and the knowledge and skills necessary to provide effective instruction and assess student progress.

Indicators:

- 1a. Professional development includes learning experiences and resources to ensure that teachers understand how the subject(s) they teach addresses the Maryland content standards and the relationships between the subjects they teach and other subjects in the curriculum.
- 1b. Professional development provides opportunities for teachers to examine, observe, practice, and receive feedback on their use of research-based instructional strategies to help all of their students master Maryland content standards.
- 1c. Professional development provides ongoing opportunities for teachers to examine a variety of classroom assessments, practice using them in their classrooms, and analyze the results to (1) understand and report on student mastery of Maryland content standards, (2) identify gaps in student learning, and (3) adjust instruction.

Standard 2 Research-based
Effective professional development ensures that all teachers have the knowledge, skills, and dispositions to apply research to decision making.

Indicators:

- 2a. Professional development includes ongoing opportunities for teachers to read and reflect on current research on topics of interest to them and consistent with state and local school improvement priorities.
- 2b. Professional development may involve two-way interactions with researchers to discuss research design, data collection, analysis, and reporting to assist teachers in understanding what works, particularly in areas where there may be competing perspectives and conclusions.
- 2c. Professional development involves individual teachers or teams of teachers, often in collaboration with researchers, in action research to test their own hypotheses and to report the results about professional development program impact or the effectiveness of particular instructional strategies and programs for teachers and students.

Standard 3 Collaboration
Effective professional development ensures that teachers have the knowledge, skills, and dispositions to collaborate with others to improve instruction.

Indicators:

- 3a. Professional development provides ongoing opportunities for teachers to practice working with colleagues, including other teachers, principals, counselors, social workers, and others, and emphasizes that collaboration is a means and not an end in addressing issues related to school improvement and improved student learning.
- 3b. Professional development emphasizes constructive management of conflict and fosters understanding that disagreement and conflict are potentially beneficial elements of professional discourse.
- 3c. Professional development relies on communication technologies to broaden the scope of collaboration.

Standard 4 Diverse learning needs
Effective professional development ensures that all teachers have the knowledge, skills, and dispositions to meet the diverse learning needs of all of their students.

Indicators:

- 4a. Professional development focuses on developing teachers' understanding of and disposition to acknowledge the diversity of student learning styles and needs.
- 4b. Professional development provides opportunities for teachers to develop and demonstrate the knowledge and skills necessary to design and implement instructional and assessment strategies that meet diverse student learning needs and help all students master Maryland content standards.
- 4c. Professional development fosters teachers' respect for all students and guides teachers in setting and maintaining high expectations for all students to demonstrate proficiency on Maryland content standards.

Standard 5 Student learning environments
Effective professional development ensures that all teachers are able to create safe, secure, and supportive learning environments for all students.

Indicators:

- 5a. Professional development fosters a safe, inclusive, equitable learning community where teachers, administrators and students participate in maintaining a climate of caring and respect.
- 5b. Professional development provides opportunities for teachers to develop and practice student ownership of management routines and practice creative solutions to conflicts.
- 5c. Professional development provides opportunities for teachers to use data on student behavior such as discipline referrals, suspension information and school climate surveys to analyze and refine practices that promote optimal learning environments.

Standard 6 Family involvement
Effective professional development ensures that all teachers have the knowledge, skills, and dispositions to involve families and other community members as active partners in their children's education.

Indicators:

- 6a. Professional development provides opportunities for teachers to develop and demonstrate oral and written communication skills to build partnerships with parents and community members and to communicate expectations for student mastery of Maryland content standards and success on approved national, state, and local assessments.
- 6b. Professional development fosters teachers' understanding and respect for varying cultural backgrounds of students, families, and the community and how the diversity and richness of these cultural backgrounds can serve as foundations for student learning.
- 6c. Professional development includes opportunities for teachers to master the use of technology to strengthen partnerships with families and the community.

Process Standards

Standard 7 Data-driven
Effective teacher professional development relies on rigorous analysis of data.

Indicators:

- 7a. Individuals who plan professional development have ready access to high-quality student data from various sources that are organized in user-friendly formats.
- 7b. Individuals who plan professional development have the knowledge and skills necessary to use disaggregated student data (by race, gender, English language learners, special education, and eligibility for free or reduced price meals) for planning, implementation, and evaluation of professional development and instructional programs.
- 7c. School and district schedules set aside time for teachers and others to examine student data as the starting point for planning professional development.
- 7d. Individuals who plan professional development carefully analyze a variety of disaggregated student data to identify gaps between student learning and standards for proficiency to inform the choice of the content of professional development.

- 7e. As appropriate to school and district needs, data analysis focuses on results from approved national, state, and local assessments, as well as student work samples and portfolios, and behavioral indicators such as attendance and disciplinary referrals.

**Standard
8**

Evaluation

Rigorous evaluations assess the impact of professional development on teaching and student learning.

Indicators:

- 8a. Individuals who plan professional development ensure that plans include adequate resources for an objective evaluation and for reporting and disseminating the results.
- 8b. Individuals who plan professional development (1) identify the kinds of evidence about teaching and student learning that will be collected and used as indicators of the success of professional development, and (2) consistent with progress benchmarks and goals, determine how and when the data will be collected and reported.
- 8c. Evaluation should also assess the impact of professional development on school culture and organization to support school improvement efforts.
- 8d. Sponsors of professional development communicate the results of evaluations to key stakeholder groups, including teachers, school and district leaders, central office staff, providers, policymakers, and parents, in a timely fashion.

**Standard
9**

Design and teacher learning

Effective professional development content and process reflect best practices in workplace learning and in-depth understanding of how and why adults learn.

Indicators:

- 9a. Professional development matches learning experiences, including the intensity and duration, with individual teacher needs, current knowledge and skills, and learning goals.
- 9b. Professional development combines a variety of learning experiences, including, but not limited to, individual study, demonstrations, observation, practice, feedback, and reflection as well as opportunities for collaboration and problem solving among colleagues.
- 9c. Professional development provides extensive follow-up, including, but not limited to, classroom demonstrations, feedback on mastery of new knowledge, feedback on demonstration of new skills, peer coaching and mentoring, and opportunities for additional study.
- 9d. Professional development relies on information technologies to provide more extensive and diverse content, and it also relies on communication technologies to expand access and participation and to create virtual professional learning communities.
- 9e. Professional development recognizes and draws on the knowledge, skills, and dispositions of successful teachers by including them as leaders, facilitators, and resources in professional learning opportunities.

Appendix H: Guide for Professional Development for PILOT/New/Revised Curriculum Implementation and Support

In order to support the dissemination of new/pilot and revised curricula within the system, curriculum offices must carefully plan for each phase of the change process: initiation (introductory phase), implementation (ongoing support phase), and institutionalization (embedded practice and review phase).

INITIATION PHASE

When beginning the initiation phase, curriculum offices should plan for the training of curriculum writers. To ensure internal consistency and quality curriculum guides, curriculum writers will be required to complete a curriculum writer course that focuses on systemwide priorities for student learning and instruction (e.g., the Articulated Instruction Module, differentiation, academic rigor, and assessment). Upon completion of this course, participants may enter the curriculum writers selection process.

Curriculum offices should also begin planning the roll-out of a new or revised curriculum for all appropriate audiences.

Audiences

Curriculum offices will design activities to address the needs of identified audiences. These audiences include teachers/support personnel (e.g., paraeducators, reading specialists, mentors, and department chairs) who will implement the new curriculum, administrators who will supervise the instruction of the new curriculum/pilot program, and parents/guardians of the students who will learn from the new curriculum/pilot program. Each audience will need to be aware of the important changes from the previous curriculum, the rationale for the changes, and the potential impact of the changes on student learning.

Teachers, administrators, parents, and students will all develop a common language for learning through consistent communication of the essential skills required for academic progress. For each audience, the curriculum office will consider the required skills and knowledge related to:

- The content of the new curriculum.
- The process for ensuring quality instruction.
- The available resources to support student learning.

Teachers and Support Personnel

In their professional development plan, curriculum offices will address the needs of teachers and support personnel in acquiring the required content knowledge. Their plans will include:

- Standards and objectives students are expected to learn, accompanying indicators of mastery, and constructive methods for responding to the diverse needs of all students.
- A scope and sequence of curricular objectives.
- Formative assessment measures.
- Professional development customized to meet the needs of select groups of support personnel.

The curriculum offices will address the following process skills to ensure quality instruction:

- Understanding of the scope and sequence of curricular objectives.
- Integrating technology.
- Implementing strategies for student engagement.
- Differentiating instruction according to students' learning needs.
- Communicating student progress to parents.

The professional development plan will outline how teacher, student, and parent resources will support student learning. The curriculum offices may collaborate with other BCPS offices to provide:

- Teacher resources to support curriculum implementation, encourage reflection, and facilitate data analysis.
- Resources to facilitate parent-teacher partnerships, strengthen home-school communication, and support student learning at home. These resources may include:
 - Parent summaries and helpful hints.
 - Overviews explaining important vocabulary.
 - Lists of books for students to read.
 - Handouts with activities to support learning at home.
 - Links to educational Web sites.

Administrators and School Leaders

The professional development plan should consider the roles of school leaders who will supervise the instruction of the newly revised curriculum and address the following content- and process-related topics:

- What does effective implementation of the curriculum look like?
- How do curriculum standards align with school improvement goals?
- What methods/approaches (e.g., lesson studies, peer observations, grade-level discussions, and looking-at-student-work groups) might facilitate effective instruction and teachers' professional growth?

Professional development resources for administrators will include:

- A general scope and sequence of curricular objectives.
- A list of look-fors/indicators of effective implementation and active student learning.
- A summary of key curricular components to communicate with parents.
- Information that will assist administrators in providing parents/guardians with an understanding of how changes in the newly revised curriculum will affect what the classroom instruction looks like. Questions to consider include the following:
 - Is there a new or supplemental text?
 - Does the textbook have a Web site component?
 - How is technology integrated?
 - Will the class period be extended?
 - How will student progress be assessed?
 - What types of homework might be assigned to students?

Parents/Guardians

In addition to outlining the support provided for teachers and administrators, the professional development plan should address the needs of parents of students who will learn from the new curriculum. The curriculum office should consider how the following information will be shared with parents:

- Why the curriculum revisions were necessary.
- How the changes will improve students' ability to master the content.
- What process has been established for parents to raise questions, offer feedback, and receive periodic updates.

IMPLEMENTATION PHASE

Effective follow-up professional development related to the learning of a new curriculum will take on many forms, including additional presentations and communication of new content, ongoing opportunities to observe effective practice, and opportunities to be observed and to receive feedback. This phase consists of professional development activities that are available over extended periods of time.

Activities should include:

IMPLEMENTING THE PILOT PROGRAM

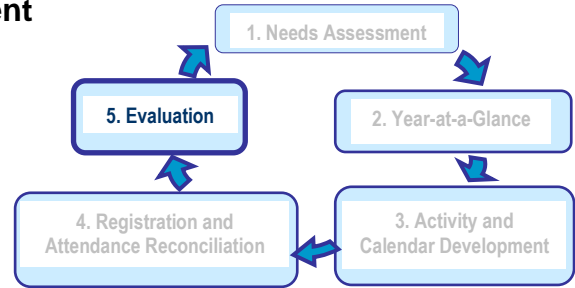
- Implementing the new curriculum.
- Modeling differentiation strategies.
- Providing ongoing opportunities for practice and feedback on the new curriculum.
- Providing a variety of opportunities for participants to learn and master the new curriculum.
- Ensuring opportunities for teachers to observe the applications of the new curriculum.

INSTITUTIONALIZATION PHASE

The institutionalization phase will focus on the evaluation of the professional development outcomes. Additionally, evaluation will set observable and measurable outcomes and indicators that will provide the framework for data collection and analysis. Curriculum offices should consider the following questions when planning evaluation:

1. How will the evaluation explain whether the plan was implemented successfully?
2. What measurable outcomes and indicators will provide the framework for data collection and analysis?
3. How will the evaluation help identify the factors contributing toward effective or ineffective implementation and what could have been done differently?
4. How will the evaluation explain whether the professional development achieved the intended outcomes for participant behavior and student achievement?
5. How will the evaluation results pinpoint areas where additional professional development and support may be necessary?
6. Who will conduct the evaluation?
7. When will the evaluation report be completed?

Appendix I: Evaluating Professional Development



Objective: Participants will implement a process to evaluate the effectiveness of professional development in terms of learner achievement.

STEP 1: Identify the professional development objective, expected results, outcomes, and indicators.

STEP 2: Establish Look-fors.

STEP 3: Develop pre- and post-assessment measures.

STEP 4: Examine the results.

STEP 5: Use the information to adjust follow-up professional development and to inform next year's Year-at-a-Glance initiatives.

STEP 1: Identify the professional development objective, expected results, outcomes, and indicators.

Review the professional development Year-at-a-Glance to select an initiative to evaluate. Note the professional development objective and the expected results.

Initiatives are supported by professional development activities (e.g. workshops, courses, book studies, onsite support, peer coaching). Consider what activities will be implemented in support of the initiative. What are the specific outcomes and indicators for each activity?

STEP 2: Establish Look-fors.

Identify indicators of effective and ineffective implementation.

- What would be visible if effective implementation were taking place?
- How could it be determined that participants' new knowledge and skills were being put into practice?
- Which specific actions or behaviors distinguish effective use from ineffective/inappropriate use?

Specify dimensions of quantity (e.g. frequency and regularity) and quality (e.g. appropriateness and adequacy).

- Quantity categories/levels: always, usually, occasionally, never, daily, once a week, once a month, annually
- Quality categories/levels: exemplary, appropriate, inappropriate, ideal, acceptable, unacceptable

Consider the phases of implementation:

- What specific actions or behaviors should be visible when an initiative is in its introductory phase?
- What should be observable when a participant is supported through guided practice?
- What tasks should a participant be able to demonstrate through independent practice?

Sample Look-for Guide Format

Criteria	Indicators of Effective Implementation	Notes / List of Observable Tasks	Time Spent / Number of Instances
Available Resources:			

STEP 3: Develop Pre- and Post-assessment Measures.

Use the look-fors to design targeted pre- and post-assessments for professional development participants.

The online PD Cycle provides a Web-based tool for building surveys. This resource is available at <https://intranet.bcps.org/apps/pdeval/EvalAddEdit.aspx>. Initial surveys are to be released by the offering manager/instructor after the conclusion of the offering. This tool includes a bank of survey items and allows for the customization of survey items according to specific professional development outcomes and indicators.

Survey Tips

- Provide clear directions.
- Avoid double-barreled items.
- Limit the survey to twenty response items. Estimate the maximum time of fifteen to twenty minutes to complete all responses.
- Allow for “don’t know”, “no opinion”, “neutral”, or “not applicable”.
- Follow up with non-respondents to achieve an eighty percent completion target.

STEP 4: Examine the results.

Offices should examine the following data points to determine the effectiveness of the professional development:

- Did the participants acquire the intended knowledge and skills?
- Are the desired strategies being implemented?
- Are the participants applying the new knowledge and skills appropriately/effectively?
- Is the implementation of the strategies having the desired impact on student performance?

STEP 5: Use the information to adjust follow-up professional development and to inform next year's Year-at-a-Glance initiatives.

Think Abouts:

- Did the professional development take place as planned?
Consider:
 - Targeted/expected participants
 - Adequacy/availability of resources
 - Intended frequency and duration of activities
 - Key personnel and their roles/responsibilities
- Did the initiative attain the expected results?

If the answer is no to either of the first two questions...

- What contextual factors may have influenced the professional development initiative, participant performance, and/or student learning results?
- Based on the evaluation results, what adjustments will be made for next year's professional development?

Evaluating Professional Development

Five Levels of Information

The evaluation component of the Professional Development Cycle addresses five critical levels of information:

1. Participants' Reactions
2. Participants' Learning
3. Organization Support and Change
4. Participants' Use of New Knowledge and Skills
5. Student Learning Outcomes

LEVEL 1 – PARTICIPANTS' REACTIONS

How did participants regard their professional development experience?

Data collection

Level 1 data collection methods include surveys, interviews, and focus groups.

Sublevels of information – Content, Process, and Context

Content:

- Addresses the relevance, utility, and timeliness of the topics explored.
- Focuses on the new knowledge, skills, and understandings.
- Relates to the magnitude, scope, credibility, and practicality of the change required to implement the new knowledge.

Sample survey items:

- The content presented was relevant to my professional responsibilities.
- The professional development addressed an important need critical to supporting student learning.
- The information will be useful in my professional setting.

Process:

- Relates to the delivery, structure, and organization of the professional development.
- May focus on program leaders and specific activities.
- May focus on structure and format of activities and how well activities facilitated participants' learning.

Sample survey items:

- The presentation techniques facilitated my learning.
- The professional development strategies used were relevant to the topic.
- The materials used enhanced my learning.

Context:

- Relates to the setting of the professional development experience.
- Provides information on the background and current reality of the environment in which the professional development takes place. (This applies to formal formats and job-embedded activities.)
- Considers the participants' background, current position, level/years of experience, previous learning experiences, and participation as a learner during the activity.

Sample survey items:

- The facilities were conducive to learning.
- The accommodations were appropriate for the activities involved.
- How would you rate yourself as a learner? Non-Learner, Semi-Attentive, Engaged Recipient, Active Cooperator, Advanced Synthesizer

LEVEL 2 – PARTICIPANTS' LEARNING

To what extent did participants acquire the intended knowledge, skills, and attitudes or beliefs?

Data collection

Cognitive and psychomotor goals can be evaluated through participant surveys (immediate or follow-up), interviews, personal logs/journals, case studies, observations. In the case of observations, participants should be made aware of the criteria used to evaluate learning.

In the case of participant surveys, items must be customized according to the content of the professional development. For example, the survey might list the intended learning outcomes and have participants rate their new level of understanding.

Outcomes	Knowledge/Skill Level			
	None	Novice	Apprentice	Expert

Another survey format might provide open-ended response prompts.

I learned...	
Most helpful...	Least helpful...
I would like to learn...	Appreciations, Concerns, Suggestions...

Affective goals can be evaluated through pre- and post-assessment surveys, interviews, and logs/journals. Affective change can only be determined after implementation.

When planning to evaluate the level of affective change, keep in mind that the Model of Teacher Change occurs in the following order:

Professional Development → Change in classroom practices →
Change in student learning → Change in teachers' attitudes & beliefs
(Guskey, 2000)

Sublevels of information – Cognitive, Psychomotor, and Affective Goals

Cognitive Goals:

- Relate to specific elements of content and pedagogical knowledge.
- Address participants' understanding of the theory behind effective strategies, the best practices for successful implementation, the procedures for making appropriate accommodations, and the expected outcomes for student learning.

Psychomotor Goals:

- Describe the skills, practices, and behaviors participants are expected to acquire (e.g. employ cooperative learning strategies, incorporate higher order thinking skills).
- Involve the participants' ability to use the content in new and different contexts.

Affective Goals:

- Address the attitudes, beliefs, or dispositions that participants are expected to develop as a result of the professional development experience.
- May relate to participants' assumptions or perceptions.

Affective Outcomes relate to:

- Teachers' beliefs about effective teaching.
- Teacher's expectations for students' learning.
- Teachers' concerns about change.
- Teachers' perceived sense of efficacy in teaching and learning situations.

LEVEL 3 – ORGANIZATION SUPPORT AND CHANGE

How did the professional development initiative impact organizational procedures?

Data collection

Data collection methods must include initial online surveys, and may include observations, policy reviews, analysis of meeting minutes, structured interviews, learning logs/journals, and participant portfolios.

Sublevels of information – Organization Policies, Resources, Protection from Intrusions, Openness to Experimentation, Collegial Support, Principal’s Leadership and Support, Higher-level Administrators’ Leadership and Support, Recognition of Success, Provision of Time

Organization Policies:

- The professional development activity aligns with the systemwide priorities.
- The professional development activity aligns with the school improvement goals.

Resources:

- Relevant information and materials are available during planning and implementation.
- Resources are provided in a timely manner.
- Access to expertise and support is available when problems arise.

Protection from Intrusions:

- There is uninterrupted time for collaboration and planning.
- Commitments to planning time and other supports for professional development are honored.

Openness to Experimentation and Alleviation of Fears:

- Participants are encouraged to try new practices or strategies.
- Participants are given feedback in a manner that supports implementation of new approaches.

Collegial Support:

- Participants have opportunities to discuss with colleagues ideas and strategies to support implementation.
- Participants frequently engage in conversations about student performance results.

Principal’s Leadership and Support:

- The school leadership encourages staff to learn and participate in new programs.
- The school leadership regularly reviews with staff information on student learning progress.
- The school leadership facilitates regular follow-up sessions and activities.
- The school leadership shares results of the new strategies with all staff members.

Higher-level Administrators' Leadership and Support:

- Opportunities are provided for sharing with colleagues from other schools.
- Central office personnel meet requests for information and/or resources in a timely manner.
- Central office personnel guide and support follow-up activities.

Recognition of Success:

- All staff members regularly engage in analyses of student data to note successes and identify areas that need improvement.
- Successful results with students are a regular part of collegial discussion.
- Teachers are recognized and honored for their successes with students.

Provision of Time:

- Discussions about ways to improve results are a regular part of the participants' work day.
- Participants have time to revise implementation of the new strategies and make appropriate adaptations.
- Participants are provided time to discuss implementation difficulties with colleagues and develop solutions.

LEVEL 4 – PARTICIPANTS' USE OF NEW KNOWLEDGE AND SKILLS

To what extent did participants apply the new knowledge and skills?

Data collection

Data collection methods include observations; surveys; implementation logs/reflection journals, portfolios, focus groups; and participant, supervisor, and student interviews.

Sublevels of information – Stages of Concern, Levels of Use

Stages of Concern (4 categories, 7 stages) – Knowing what most concerns participants will inform what follow-up professional development would be most appropriate.

- Awareness (0) – unaware of change or resistant to learning about it.
- Self
 - Informational (1) – just learning about the change.
 - Personal (2) – concerned about how the change might affect them.
- Task
 - Management (3) – focus on the processes and tasks necessary to make the change work; concerned with efficiency, organization, management, scheduling, and time demands.
- Impact
 - Consequence (4) – concerned about how the change affects students and which adaptations might be necessary to improve results.
 - Collaboration (5) – considers how results might be improved by actively working with colleagues.

- Refocusing (6) – explores how better results might be attained through additional refinement and adaptation.

Levels of Use (2 categories, 7 stages) – When assessing the participants' use of knowledge and skills, an accompanying look-for guide helps to specify clear behavioral indicators of use and nonuse.

- Nonuse
 - Nonuse (0) – taking no action with respect to new knowledge or skills.
 - Orientation (1) – just beginning to seek information.
 - Preparation (2) – acquired the new knowledge and skills and preparing for implementation. (Includes those who have just completed a PD experience.)
- Use
 - Mechanical (3) – focuses on day-to-day use, tends to be disjointed and uncoordinated with little insight or reflection.
 - Routine (4a) – establishes a regular pattern, but makes few adjustments for improvement.
 - Refinement (4b) – assesses impact on students and makes changes to improve effectiveness.
 - Integration (5) – makes deliberate efforts to collaborate with others to achieve a stronger collective impact on students.
 - Renewal (6) – reevaluates the quality of use and seeks more effective alternatives to established patterns.

LEVEL 5 – STUDENT LEARNING OUTCOMES

To what extent did students acquire the intended knowledge, skills, attitudes, beliefs, or behaviors?

Data collection

Before collecting Level 5 data, define desired outcomes related to student performance (i.e. achievement results, reading level, homework completion, attendance, graduation rate) and identify appropriate sources of information. Consider what student performance data are already being collected. Existing data collection methods may include report cards, assessTrax, classroom assessments, AIM progress reporting, and the Bridge Plan submission process.

Sublevels of information – Cognitive, Psychomotor, and Affective Outcomes

Cognitive learning outcomes relate to the students' academic achievements.

Assessment methods include:

- Standardized achievement/performance assessments.
- Classroom assessments.
- Group tasks.
- Portfolios/collections of student work.
- Report card grades.
- Questionnaires/interviews.

- School records (e.g. honor roll, enrollment in advanced-level courses, academic scholarships earned).

Psychomotor learning outcomes include the actions, behaviors, and practices related to the professional development activity's intended student learning goals.

Assessment methods include:

- Observations.
- Questionnaires/interviews.
- School records (e.g. disciplinary data, attendance, participation in service organizations, use of the media center).

Affective learning outcomes relate to the students' attitudes, beliefs, feelings, dispositions, interests, aspirations, and motivation for learning.

- The most common assessment methods are questionnaires and interviews.
- As with participants' learning outcomes, improvements in students' affective outcomes *follow* improvements in cognitive outcomes.

Change in classroom practices → Change in cognitive student learning outcomes → Change in affective student learning outcomes

Bibliography

- Bernhardt, V. (2003). *Using data to improve student learning*. Larchmont, NY: Eye On Education, Inc.
- Champion, R. (2002, Spring). What to do when the data are words. *Journal of Staff Development*, 64-65.
- Champion, R. (2009, April 29). *Starting PD with the end in mind*. Presentation at Washington County Public Schools, Hagerstown, Maryland.
- Guskey, T. (2000). *Evaluating Professional Development*. Thousand Oaks, CA: Corwin Press, Inc.
- Holcomb, E. (1999). *Getting excited about data: How to combine people, passion, and proof*. Thousand Oaks, CA: Corwin Press, Inc.
- Maryland State Department of Education. (2008). *Maryland teacher professional development evaluation guide*. Retrieved May 7, 2009 from <http://www.marylandpublicschools.org/>
- Learning Point Associates. (2004). *Guide to using data in school improvement efforts*. Retrieved May 16, 2008 from www.learningpt.org
- Zepeda, S. (2008). *Professional development: What works*. Larchmont, NY: Eye On Education, Inc.