What will be APA/PA's Unconventional Shale Gas Development Strategy and Policy?

A report from the Shale Energy Committee of the Pennsylvania Chapter of the American Planning Association

May 16, 2016

TABLE OF CONTENTS Page

Executive Summary---------- 2

Chapter 1: Introduction---------- 6

Chapter 2: Critical Issue / Opportunity – Gas Utilization----------11

Chapter 3: Critical Issue / Opportunity – Local and County Planning Capacity-------14

Chapter 4: Critical Issue / Opportunity – Land Use Conflicts, Public Safety & Environmental Stewardship ----------17

Final Conclusions and Recommendations ----------20

Appendices----------21

Appendix 1 – Lehigh Valley/Berks Sections Statement----------21
Appendix 2 – Central Section Statement----------26
Appendix 3 – Northeast Section Statement----------31
Appendix 4 – Northwest Section Statement----------35
Appendix 5 – Southwest Section Statement----------36
Appendix 6 – Planning Priorities Matrix----------41

American Planning Association Pennsylvania Chapter
Shale Energy Committee Policy Report
Final Draft Report
(May 16, 2016)

Executive Summary

Why a Shale Energy Committee?

Over the years it has become clear that natural gas development in the Marcellus and Utica geologic formations can provide opportunities for achieving energy security from abroad and provide economic development opportunities for Pennsylvania. However, the role that it should play over the long-term and how it will be managed brings lots of questions, issues and opinions to the public forum and creates a new paradigm in which the planning community must operate.

During October and November of 2013, 110 individuals participated in a membership survey of attitudes in regard to shale energy development. Based on the results of membership survey, the APA-PA Board decided to establish a Shale Energy Committee.

Committee Structure

Obtaining a diversity of stakeholder views was a critical objective of the Board. Thus, membership was solicited not only from membership in the six regional sections of APA-PA, but also from outside the organization membership. At one time or another, thirty-four people have served on the committee. Each APA-PA Section was allowed to identify three voting members as part of their contingent of committee representatives.

The Mission

The mission of the committee was to provide recommendations for a strategy and policy to address the evolving shale energy industry impact on planning responsibilities throughout the Commonwealth.

Key Issues / Opportunities

The Shale Energy Committee has identified three critical issues / opportunities.

- Gas Utilization in Pennsylvania
- Local and County Planning Capacity
- Land Use Conflicts, Public Safety and Environmental Stewardship

Gas Utilization in Pennsylvania

The expanded delivery and utilization of natural gas can provide low cost energy and basic resources for manufacturing and high tech industries thus potentially providing a competitive advantage for economic development and job creation in Pennsylvania.

Local and County Planning Capacity

Effective planning capacity at the county and local level is necessary to facilitate public and private industry investments that can create local jobs in Pennsylvania.

Land Use Conflicts, Public Safety, and Environmental Stewardship

Development associated with the shale gas industry such as wells, gathering lines, compressor stations, transmission lines, etc., have potential to create land use conflicts, and environmental stewardship and public safety concerns. Effective coordination between industry and government is the cornerstone to appropriately addressing such concerns.

Key Planning Recommendations

First, when and where appropriate, economic development funding programs should be targeted to the expanded utilization of natural gas.

Second, an active and functioning State Planning Board should play a pivotal role in advising the current and future administrations on developing and implementing strategies that will make a positive impact on our communities. The promotion of sound land use practices and effective communication between government and industry should be on the State Planning Board Agenda.

Third, state funding is essential to support planning capacity at municipal and county levels. The restoration of financial and technical assistance should be included in future state budgets. The current DCED Municipal Assistance Program or any other future program would be an acceptable avenue if expanded and sufficiently funded to support planning activities across the Commonwealth**.**

Fourth, Article 1, Section 27 of the Pennsylvania Constitution often referred to as the Environmental Rights Amendment, should be one important guiding principle as should all articles of the Constitution and other applicable laws in the development and implementation of strategic actions.

Finally, the Pennsylvania Municipalities Planning Code (Act 247 of 1968) must remain the foundation for land use regulation at the local, county, multi-municipal, regional and/or intrastate levels.

Strategic Actions

This report specifically addresses fifteen strategic actions identified as important steps in helping our communities realize the benefits of shale energy development leading to an improved quality of life for all Pennsylvanians. Those strategic actions are summarized as follows:

- Ensuring economic development programs to expand the use of natural gas
- Expanding workforce skills to meet various industry recruitment needs
- Updating comprehensive plans to address shale energy development
- Addressing the cyclical nature of shale energy development in capital improvement programs
- Keeping comprehensive plans current on all issues
- Monitoring the impact of population change
- Improving GIS capabilities to aid in decision-making
- Identifying new and untapped opportunities through cooperative efforts between government and industry
- Expanding focus of the Pennsylvania State Planning Board on shale energy development
- Early coordination between industry and government to maximize the use of pipeline corridors
- Clear communications on regulatory responsibilities of the Federal and state government
- Clear and comprehensive communications with all stakeholders on gas line safety
- Expanding role of county planning in stakeholder education
- Consistent land use regulations to facilitate coordinated development that minimizes negative impacts
- Increasing inter-departmental coordination guided by Pennsylvania Keystone Principles

Regional Differences

The first organizational meeting of the committee was held in State College on November 17, 2014. It became very clear early in the meeting that the way shale energy development is perceived, and the issues associated with shale development vary considerably on a region by region basis and that developing consensus on strategies and policy would be a challenge. Since that time the Shale Energy Committee has worked diligently to achieve consensus on the key issues / opportunities, key planning recommendations, and strategic actions that will be important considerations if this commonwealth is to realize the full benefits of shale energy development and manage the associated impacts. Nonetheless, there are significant regional differences in how shale energy development is perceived and what the priorities are for implementing various strategic actions. These regional differences need to be accounted for as the organization moves forward with implementation efforts. The regional priorities are specifically noted in the body of the report and in the appendices.

Conclusion

Shale Energy Development has had a significant impact on this Commonwealth to date. The industry is very cyclical by nature and the planning community needs to understand this phenomenon and adapt to this situation within the planning responsibilities it fulfills. This policy report establishes a framework that may assist APA-PA in helping its members meet those responsibilities. Additionally, this document may serve to advise elected officials, state agencies and other stakeholders of strategies that can be implemented to avoid conflicts and promote mutual efforts to improve the quality of life for all Pennsylvanians.

Two recommendations remain paramount to our ability to achieve implementation of the planning recommendations and strategic actions noted in this report.

First, a reinvigorated State Planning Board will need to play an integral role in advising the Administration on the development and implementation of a ***Strategy to Move Pennsylvania Forward***. Until recently, the State Planning Board has been inactive for a period of time and the current composition of the Board has some vacancies and may not have the diversity of key stakeholders from both the private and public sector to accomplish such a task. In the past, the board has played an instrumental role in the development and implementation of strategic plans to promote the welfare of the Commonwealth and that role should be reestablished. The State Planning Board should be inclusive of varied interests and geographic representation but most importantly reflect strong leadership and ability to affect positive change.

Second, in the past, the DCED local government assistance programs including the likes of the Land Use Planning and Technical Assistance Program (LUPTAP) were critical in promoting effective local planning capacity. It is paramount that the current Municipal Assistance Program supports such planning with an adequate funding stream. We need to keep in mind that planning capacity at the county and local municipal level is essential if we are to make appropriate public investments in infrastructure to help facilitate energy related investments from the private sector that create jobs.

Chapter 1 – Introduction

History

The first Marcellus Shale well was drilled by Range Resources in 2004 in Mount Pleasant Township, Washington County. Since that time, thousands of wells have been drilled in Pennsylvania. The most active development of Marcellus and now Utica shale plays have occurred in the southwestern most corner of Pennsylvania primarily in Washington and Greene Counties and northcentral portion of Pennsylvania primarily in Bradford, Tioga, Susquehanna and Lycoming counties. Currently, the Delaware River Basin Commission has placed a moratorium on drilling permits within the Delaware River Watershed.

Over the years it has become clear that natural gas development in the Marcellus and Utica geologic formations can provide opportunities for achieving energy security and provide economic development opportunities for Pennsylvania. However, how it will be managed brings lots of questions, issues and opinions to the public forum and creates a new paradigm in which the planning community must operate.

Until 2013, APA-PA had not comprehensively addressed how the planning community should respond to unconventional shale development, whether the organization should have a policy guide for the planning community and what resources are needed within the evolving planning paradigm.

Within this backdrop APA-PA Leadership and the 2013 Annual Conference Committee decided that two interrelated workshop sessions on unconventional shale gas development should be part of the annual conference in October 2013 and be used to survey the membership on their thoughts and attitudes about the subject. The purpose of the survey was to gain some initial insights into the diversity of attitudes and opinions the membership may have in regard to unconventional shale gas development. The intent was to further identify issues the organization may need to address if it decides to take a proactive role in serving both planners and the communities they serve in responding to this new planning paradigm. The survey was not intended to develop statistically valid results for use in developing a consensus on any issues or prospective organization policy. A total of 110 individuals participated in the survey process.

Six questions were demographic in nature which allowed for cross-tabulation with 13 issue oriented questions to identify potential trends related to how those surveyed responded. The six demographic questions addressed the following: 1) attendance at workshop sessions, 2) planning experience, 3) client relationship to gas development, 4) experience by location, 5) sources of gas development knowledge, and 6) familiarity with Pennsylvania Act 13 Impact Fees. The other thirteen issue oriented survey questions addressed the following:

#	Question Green = Majority with Positive Response Orange = Majority with Negative or No Response Note: Questions 1 through 6 were general demographic questions	% Affirmative Response October 21st Survey	% Affirmative Response Web Survey November 20th
7	Shale Gas development is an economic game changer the likes of which we have not seen since the lumber and coal eras.	96%	78%
8	Natural Gas will continue to play and increasingly important economic role in PA over the next 50 Years.	100%	79%
9	Gas production and usage is increasing and will continue to increase world-wide and nationally. This is a trend our communities need to focus on.	100%	73%
10	Communities need to have a plan and communicate their vision in order to help the industry sustain this economic engine over the long-term.	100%	65%
11	The current Act 13 Impact Fee Revenue Allocation Formula is fair and equitable distribution approach.	47%	29%
12	Impact Fee Revenues are allowing our communities to effectively deal with some of the negative impacts on housing and social services.	70%	38%
13	Impact Fee Revenues are allowing us to deal with the impacts on the transportation network.	67%	35%
14	Overall the Commonwealth has done a good job in providing the tools and resources to help us realize the benefits of the gas play and appropriately manage the impacts.	39%	20%
15	Counties should at a minimum be modifying their comprehensive plans and zoning to more specifically address unconventional gas development.	96%	79%
16	Communities need to have strategies for increasing gas utilization over the long-term as critical components of their economic development strategy.	92%	61%
17	Communities through regional cooperative efforts need to partner with industry to develop strategic plans to maximize the benefits, manage the impacts and minimize the costs.	100%	72%
18	APA-PA should have a specific policy on the role this organization will play in the evolution of the unconventional gas play.	90%	76%
19	APA-PA should establish a specific committee / task force to track, develop policy, and undertake legislative coordination related to unconventional gas.	91%	77%

The full details of the survey are available in a report titled: ***What will be APA/PA's Unconventional Shale Gas Development Strategy and Policy? A report on the results from the APA-PA Conference & Web-site Membership Survey (January 17, 2014).***

Based on the results of the survey the APA-PA Board decided to establish a Shale Energy Committee. The mission of the committee would be to provide recommendations for a strategy and policy to address the evolving shale energy industry impact on planning responsibilities throughout the Commonwealth. Each of the six sections of APA-PA was asked to provide names of individuals who would be willing to serve on the committee. Thirty-two individuals volunteered to serve and were placed on the committee roster.

The first organizational meeting of the committee was held in State College on November 17, 2014. The initial discussions made it very clear that the way shale energy development is perceived, and the issues associated with shale development vary considerably on a region by region basis and that developing consensus on strategies and policy would be a challenge. However, there were several important things that surfaced during that initial meeting. First,

committee members weren't interested in committing a lot of time in a futile effort that would go nowhere in terms of implementation. Second, planning capacity varies widely among counties and municipalities and that needs to be addressed if we are to make a difference. Third, the fact that the Pennsylvania State Planning Board had been inactive and not involved with shale energy development was viewed as a concern in regard to the influence the planning community may have in defining how the Commonwealth addresses the evolving industry.

As a result of the initial meeting, the committee members from each section provided additional detailed information on regional opportunities, issues and key planning recommendations. Because of the logistics associated with trying to get 32 individuals to meet in one location, all communications and work since November 2014 have been done remotely by e-mail, phone and conference calls.

Correspondence regarding the efforts of the committee was sent to Secretary Hanger (Governor's Office of Planning and Policy), Secretary Quigley (DEP) and Executive Deputy Secretary Weaver (DCED). The intent was to introduce our efforts and keep them informed of key issues. In addition, several of the Shale Energy Committee members have also served on the Governor's Pipeline Infrastructure Task Force (PITF) Work Groups.

The Shale Energy Committee

Obtaining a diversity of stakeholder views was a critical objective of the Board. Thus, membership was solicited not only from membership in the six regional sections of APA-PA, but also from outside the organization membership. At one time or another, thirty-three people have served on the committee and they are so recognized below

Key: M = Member of APA-PA NM = Non-member of APA-PA
C = Current Shale Energy Committee Member P = previously served

Lehigh Valley / Berks Section of APA-PA

The Lehigh Valley Section represents members from the following counties:
Berks, Northampton, Lehigh

NAME	ORGANIZATION	STATUS
Cheryl Auchenbach	Berks County Planning Commission	NM, C
Shannon Rossman AICP	Berks County Planning Commission	M, C
Charlie Schmehl	Urban Research & Development Corp.	M, C

Central Section of APA-PA

The Central Section represents members from the following counties:
Adams, Centre, Clinton, Columbia, Cumberland, Dauphin, Franklin, Juniata, Lancaster, Lebanon, Lycoming, Mifflin, Montour, Northumberland, Perry, Snyder, Union, York

NAME	ORGANIZATION	STATUS
Dennis Auker AICP	Auker Consulting	M, C, Chairperson
Kurt Hausammann, Jr.	Lycoming County Planning Commission	M, C
Jamie Keener AICP	HRG Inc.	M, C
Stanford Lembeck AICP	Penn State University	M, C
Tracey Vernon AICP	Vernon Land Use	M, C
Jerry Walls FAICP	Walls & Associates	M, C

Northeastern Section of APA-PA

The Northeast Section represents members from the following counties:
Bradford, Carbon, Lackawanna, Luzerne, Monroe, Pike, Schuykill, Sullivan, Susquehanna, Tioga, Wayne, Wyoming

NAME	ORGANIZATION	STATUS
Chris Barrett	Wayne County Planning Commission	NM, C
Lynelle Bennett RLA	Wyoming County Office of Community Planning	M, C
Nicole Boling	Wyoming County Office of Community Planning	M, P
Michael Mrozinski	Pike County Community Planning Dept.	M, C
Craig Rickard	Wayne County Planning Commission	NM, C
Thomas Shepstone	Shepstone Management Company	NM, C
Raymond Stolinas AICP	Bradford Co. Office of Community Planning	M, P

Northwestern Section of APA-PA

The Northwest Section represents members from the following counties:
Cameron, Clarion, Clearfield, Crawford, Elk, Erie, Forest, Jefferson, Lawrence, McKean, Mercer, Potter, Venango, Warren

NAME	ORGANIZATION	STATUS
Jodi Brennan	Clearfield County Planning & Community Development	M, P
Dan Glotz	Warren County Planning	M, P
Dan Gracenin	Mercer County Regional Planning Commission	M, P
Richard Grossman	Community Planning Consultant	NM, C
Jack Lynch	WMF Consultants	M, C
Amy McKinney	Lawrence County Planning	M, C
Zachary Pyle	Crawford County Planning Commission	M, C
Matt Quesenberry	Elk County Planning Commission	M, P
Morrie Waltz	Mourice Waltz Planners & Consultants	M, C

Southeastern Section of APA-PA

The Southeast Section represents members from the following counties:
Bucks, Chester, Delaware, Montgomery, Philadelphia

NAME	ORGANIZATION	STATUS
Christopher Lankenau AICP	Urban Partners	M, C
Jessica Noon	City of Philadelphia Water Dept.	M, P
Carol Stauffer AICP	Chester County Planning Commission	M, C

Southwestern Section of APA-PA

The Southwest Section represents members from the following counties:
Allegheny, Armstrong, Beaver, Bedford, Blair, Butler, Cambria, Fayette, Fulton, Greene, Huntingdon , Indiana, Somerset , Washington, Westmoreland

NAME	ORGANIZATION	STATUS
Lisa Cessna	Washington County Planning Commission	M, C
Frank Mancini	Beaver County Planning Commission	M, P
Dennis Martinak AICP	Mackin Engineering	M, C
Joy Ruff AICP	McCormick Taylor Associates	M, C
Christopher Wheat P.E.	Comtech Industries	M, C

The Mission, Goals & Objectives

The mission of the committee is to provide recommendations to the APA-PA Board for a strategy and policy to address the evolving shale energy industry impact on planning responsibilities throughout the Commonwealth. The goal is to provide a policy and strategy document to advise the Board and lay the framework for future action. Several important objectives were defined early on as follows:

- Determine if APA-PA needs a policy on Shale Gas Development
- Draft a policy statement if warranted
- Identify issues of concern for planners
- Identify planner resource needs
- Advise APA-PA Leadership
- Committee should be proactive and focused on implementation
- Identify and respect regional differences

Identification of Critical Issues / Opportunities, Key Planning Recommendations, and Strategic Actions

Since November 2014, the Shale Energy Committee has worked diligently to identify critical issues and opportunities, identify key planning recommendations to address the critical issues, and developed strategic action recommendations to implement the key planning recommendations. In the future important considerations for implementation will be (1) addressing regional differences (2) establishing criteria for monitoring implementation success and (3) clearly defining the role of APA-PA Leadership as well as the role of the Shale Energy Committee.

To date the Shale Energy Committee has identified three Critical Issues / Opportunities.

- Gas Utilization in Pennsylvania
- Local and County Planning Capacity
- Land Use Conflicts, Public Safety and Environmental Stewardship

Chapter 2 – Critical Issue / Opportunity: Gas Utilization in Pennsylvania

Critical Issue / Opportunity:

The expanded delivery and utilization of natural gas can provide low cost energy and basic resources for manufacturing and high tech industries thus potentially providing a competitive advantage for economic development and job creation in Pennsylvania

Key Planning Recommendations:

First, when and where appropriate, economic development funding programs should be targeted to the expanded utilization of natural gas.

Second, an active and functioning State Planning Board should play a pivotal role in advising current and future administrations on developing and implementing strategies that will make a positive impact on our communities. The promotion of sound land use practices and effective communication between government and industry should be on the State Planning Board Agenda.

Strategic Actions:

1. Economic development and community revitalization programs need to be tied not only to job creation, but also tied to expanded use of Pennsylvania's natural gas and other energy resources when feasible.

2. In order to expand job opportunities, workforce skills need to be tied to the potential expansion of regional business and industries. Regional educational resources need to be consistent with job potentials. This includes industries that develop and transmit energy resources or may use natural gas and/or its byproducts for energy or in the production processes. This will require continuous coordination between industry and the educational community. Workforce agencies are best suited to programs that enhance/develop education and skills of the workforce that tie into industry recruitment needs. It should be noted that Act 13 funds are currently available and may be used for implementing training programs to meet workforce needs.

3. As appropriate, municipal/county comprehensive plans should address an economic development strategy that identifies initiatives that targets and facilitates development of industries that must use gas for energy and/or in their production process. Such initiatives should be coordinated with economic development agencies.

Regional Differences & Priorities (Also See Appendices for Section Statements & Planning Priorities Matrix)

Each section provided a rating for each strategic action based on the following criteria:

VH: Very High Priority – Essential and should be focused on immediately since inaction may significantly compromise effectiveness in the future.

H: High Priority – should be focused on in the short term and is considered essential for long-term success.

M: Medium Priority – should always be considered and maintained on the agenda for future action since it may contribute to long-term success.

L: Low Priority – something to consider but currently viewed as having limited significance to long-term success.

N: Not a Priority – Currently, this issue or action is not seen as being of any significance in this region in regard to effectively realizing the benefits of shale energy development.

N/A: Not Applicable

Overall, strategic actions associated with gas utilization were rated as high or very high priorities warranting immediate or short-term consideration being essential to long-term success. There were two exceptions. First the southeast section rated Strategic Action #1 related to economic development programs as a medium priority warranting consideration over the long-term but not warranting immediate action primarily due to the existing strong economy that is less dependent on the development of shale energy. However, it should be recognized that there is an on-going movement in the southeast region to revitalize the manufacturing sector of the economy through expanded access to shale energy products. Second, the southwest section rated Strategic Action #2 related to job expansion and workforce skills as medium priority primarily a result of southwestern Pennsylvania seeing substantive job increases and the positive ripple effect of the shale gas industry since 2008.

Monitoring Implementation Success / Metrics:

As previously noted, implementation has been an important focus of this committee. Monitoring implementation success will be important. The following may warrant consideration in the future as criteria for evaluating implementation success related to gas utilization:

a. Establishment of state funding programs promoting the use of gas
b. Establishment of federal funding programs promoting the use of gas
c. Integration of regional economic development agency programs
d. State Planning Board action agenda that includes a shale energy strategy component
e. Number of county updated comprehensive plans with gas related development initiative

Next Steps

Implementation is critical and the APA-PA Board will need to define the entity or entities to

carry on the mission of implementation. The following provides a preliminary listing of potential actions that may warrant future consideration:

a**.** Provide information and real data on previous programs with significant benefits
b. Provide lists of previous State Planning Board Members and successes
c. Provide list of diverse stakeholder leaders for potential future State Planning Board appointments
d**.** Hold a coordination meeting with DCED to review recommendations
e. Identify and brief a champion of planning in the legislature

Chapter 3 – Critical Issue: Local and County Planning Capacity

Critical Issue**:**

Effective planning capacity at the county and local level is necessary to facilitate public and private industry investments that can create local jobs in Pennsylvania.

Key Planning Recommendation:

State funding is essential to support planning capacity at municipal and county levels. The restoration of financial and technical assistance should be included in future state budgets. The current DCED Municipal Assistance Program or any other future program would be an acceptable avenue if expanded and sufficiently funded to support planning activities across the Commonwealth**.**

Strategic Actions:

1. Recognizing the cyclical nature of the oil and gas industry and the fluctuating impact on local revenues, communities need to have long-term investment strategies. A comprehensive assessment of long-term infrastructure opportunities and needs should be undertaken. The findings should be incorporated into the Comprehensive Plan and the associated implementation strategies specifically accounted for in a Capital Improvement Program. This approach will help facilitate appropriate investments in infrastructure like energy, transportation, water, sewer, parks, public safety, human resource services and education all of which impact on public and private investments that create jobs.

2. The Pennsylvania Municipalities Planning Code requires that municipal and multi-municipal comprehensive plans be reviewed every ten years and that county comprehensive plans are updated every ten years. However, local municipalities and counties should update plans to address issues associated with development generally as well as impacts arising from specific industries including the energy industries.

3. During active drilling or construction projects, population increases from temporary or permanent workers may stress housing, social and community service resources. Appropriate public agencies, non government organizations and private sector professional organizations should jointly and systematically monitor and evaluate impacts over the long-term in order to adapt planning initiatives accordingly.

4. Planning departments should develop appropriate GIS capacities and corresponding mapping to provide corridor level guidance and to direct development decisions.

5. Shale energy development provides opportunities to realize benefits unavailable prior to development. Through cooperative efforts between industry, government agencies, and non-government agencies, planners should ensure that any environmental improvements associated with shale energy development (e.g. habitat enhancement, recreation improvement, pollution abatement, and land and habitat conservation) are realized.

Regional Differences & Priorities (Also See Appendices for Section Statements & Planning Priorities Matrix)

Depending on the strategic action, priorities varied.

Strategic Action #1 related to addressing the cyclical nature of shale development and the need for comprehensive planning and capital improvement programs was rated as high or very high with all sections.

Strategic Action #2 related to updating comprehensive plans rated high or very high with one exception. The southwest section rated it as a medium priority again primarily due to the regions extended experience with gas development resulting in improved economic conditions over a period of years.

Strategic Action #3 related to monitoring the impact of temporary or permanent population increases rated high in the northeast and northwest sections where more rural areas and lower population counties can be more impacted by population increases. It rated medium in the Southwest and Central Sections where population impacts have been felt over a period of years but seem to have become more stabilized at this time. In eastern Pennsylvania within the Lehigh Valley / Berks Section and the Southeast Section, this strategic action was considered to be not applicable since no significant population increases have been seen or are anticipated due to shale energy development.

Strategic Action #4 related the development of GIS capacity was for the most part seen as a medium priority for consideration over the long-term. The exception was in the southeast where it rated high. This is primarily due to the significant pressures for pipeline

development in this region emphasizing the need for identifying and addressing multiple opportunities and conflicts associated with pipeline development.

Strategic Action #5 related to realizing multiple benefits through cooperative efforts generally rated as a medium priority for consideration over the long-term with only the southeast section rating it as a low priority primarily due to their location outside of the area where habitat or recreational benefits could be realized from shale energy activity.

Monitoring Success / Metrics:

The following may warrant consideration in the future as criteria for evaluating implementation success related to improving planning capacity:

a. Number of counties with long-term investment plans and Capital Improvement Programs
b. Number of counties and municipalities with updated Comprehensive Plans that address shale energy development
c. Number and quality of Memorandums of Agreement (MOA's) between various agencies to cost-effectively implement monitoring systems to track development impacts.
d. Number of counties with effective GIS capabilities for use in decision-making related to shale energy development.
e. Number of counties that have realized and documented synergistic opportunities

Next Steps

a. Work with the Education Committee and the Pennsylvania Municipal Planning Education Institute (PMPEI) to ensure that educational training addresses the strategic actions identified in this report.

b. Hold a joint meeting with the Pennsylvania State Association of Township Supervisors (PSATS), Pennsylvania State Association of Boroughs, (PSAB), County Commissioners Association of Pennsylvania (CCAP), County Planning Directors Association of Pennsylvania (CPDAP) and various service provider organizations to facilitate the implementation of a cost-effective system / process to monitor development impacts over the long-term and to facilitate the development of appropriate GIS capabilities.

Chapter 4 – Critical Issue: Land Use Conflicts, Public Safety & Environmental Stewardship

Critical Issue**:**

Development associated with the shale gas industry such as wells, gathering lines, compressor stations, transmission lines, etc., have potential to create land use conflicts, and environmental stewardship and public safety concerns. Effective coordination between industry and government is the cornerstone to appropriately addressing such concerns.

Key Planning Recommendations:

First, an active and functioning State Planning Board should play a pivotal role in advising the Wolf Administration on developing and implementing a strategy to identify sound planning principles and promote effective communications and coordination between government and industry.

Second, Article I, Section 27 of the Pennsylvania Constitution often referred to as the Environmental Rights Amendment, should be one important guiding principle as should all articles of the Constitution and other applicable laws in the development and implementation of strategic actions.

Third, the Pennsylvania Municipalities Planning Code (Act 247 of 1968) must remain the foundation for land use regulation at the local, county, multi-municipal, regional and/or intrastate levels.

Strategic Actions:

1. Shale gas development is cyclical by nature. Thus, the Pennsylvania State Planning Board needs to address this issue by including representative membership that can both advise the administration and help facilitate state policy implementation.

2. Foster early coordination between industry and government to maximize use of pipeline corridors for multiple functions

3. The Federal Government and the Commonwealth should coordinate and clarify regulatory responsibilities to ensure that all types of gas lines are appropriately regulated. Those regulatory responsibilities need to be clearly communicated to the planning community and the public so that the regulatory process can be better understood by those impacted.

4. Gas line safety is a critical issue warranting clear and comprehensive communications between industry and local communities including all affected stakeholders. This is

especially important in more urbanized areas. Accurate information needs to be provided to both planning and public safety agencies. Emergency management agencies are critical partners in the implementation of effective communications.

5. County Planning should play a support role in education. Generally, education associated with optimizing land use and the protection of the public health and welfare relative to any industry (including shale development) would be within the realm of county planning. It is important that planners understand the relationship between the private property owner and the industry and the role it plays in land use decisions.

6. Consistent land use regulations across municipalities can help facilitate coordinated development to minimize negative impacts and maximize positive outcomes. In this regard county planning should take a leadership role in assisting local government address local planning capabilities and promote cooperative efforts among municipalities to facilitate consistency and cost effective regulations.

7. Inter- departmental coordination is critical and should be guided by Pennsylvania Keystone Principles previously established by prior administrations to promote sustainable economic development and conservation of resources through a coordinated interagency approach.

Regional Differences & Priorities (Also See Appendices for Section Statements & Planning Priorities Matrix)

Depending on the strategic action, priorities varied.

Strategic Action #1 related to the role of the Pennsylvania State Planning Board was seen as a high or very high priority in some of the more urbanized areas in the Central. Southeast and Lehigh Valley / Berks Sections. It was seen as only a medium priority in the more rural areas of the Southwest, Northwest, and Northeast Sections.

Strategic Action #2 related to early coordination between industry and government was generally seen as a high or very high priority.

Strategic Action #3 related to the coordination of regulatory responsibilities was rated as a high or very high priority in all sections.

Strategic Action #4 related to clear communications related to gas line safety issues was rated as a high or very high priority in four sections with the Northwest and Southwest Sections rating it as a medium priority.

Strategic Action #5 related to county planning playing a support role in education was viewed as high priority in the Central, Southeast and Lehigh Valley / Berks Sections where planning capacity is generally greater than in the Southwest, Northwest and Northeast Sections that rated this strategic action as medium.

Strategic Action #6 related to consistent land use regulations generally rated as high or very high except in the Northeast and Northwest Sections that rated it as medium. This is generally due to less pipeline development activity in these regions.

Strategic Action #7 related to inter-departmental coordination guided by Pennsylvania Keystone Principles was rated as high except in the Southeast Section where it was rated as a medium priority.

Monitoring Success / Metrics:

The following may warrant consideration as criteria for evaluating implementation success:

a. State Planning Board action agenda that includes a shale energy strategy component
b. Monitor the implementation success of DEP's PITF initiatives to promote pipeline development coordination between industry and government
c. The number and quality of new education materials clearly communicating the role of Federal and state agencies regulating shale gas and pipeline development.
d. The number of industries adopting appropriate communication strategies and community commitments to transparency
e. the establishment of regular interdepartmental meetings open to the public to monitor the coordination efforts of state agencies

Next Steps
a. Provide lists of previous State Planning Board Members and successes
b. Provide list of diverse stakeholder leaders for potential future State Planning Board appointments
c. Set up sub-committee of APA-PA representatives on the PITF to maintain coordination and monitor PITF initiatives
d. Work with the Education Committee and PMPEI to ensure that educational training addresses strategic actions 2, 4, 5 and 6 as noted above.

Final Conclusions and Recommendations

Shale Energy Development has had a significant impact on this Commonwealth to date. The industry is very cyclical by nature and the planning community needs to understand this phenomenon and adapt to this situation within the planning responsibilities it fulfills. This policy report establishes a framework that may assist the organization in helping its members meet those responsibilities.

Two recommendations remain paramount to our ability to achieve implementation of the planning recommendations and strategic actions noted in this report.

First, a reinvigorated State Planning Board will need to play an integral role in advising the Administration on the development and implementation of a ***Strategy to Move Pennsylvania Forward***. Until recently, the State Planning Board has been inactive for a period of time and the current composition of the Board has some vacancies and may not have the diversity of key stakeholders from both the private and public sector to accomplish such a task. In the past, the board has played an instrumental role in the development and implementation of strategic plans to promote the welfare of the Commonwealth and that role should be reestablished. The State Planning Board should be inclusive of varied interests and geographic representation but most importantly reflect strong leadership and ability to affect positive change.

Second, in the past, the DCED local government assistance programs including the likes of the Land Use Planning and Technical Assistance Program (LUPTAP) were critical in promoting effective local planning capacity. It is paramount that the current Municipal Assistance Program supports such planning with an adequate funding stream. We need to keep in mind that planning capacity at the county and local municipal level is essential if we are to make appropriate public investments in infrastructure to help facilitate energy related investments from the private sector that create jobs.

Appendices

Appendix 1: Lehigh Valley / Berks & Southeast Section Position Paper

MEMORANDUM

Subject: American Planning Association – Pennsylvania Chapter (APA-PA)
Shale Energy Committee
Committee Task 1 – Sectional Issues Identification
Date: January 9, 2015
From: Carol Stauffer, Committee Member, Southeastern Section
To: Committee Members of Southeastern Section and Lehigh Valley/Berks Section
Dennis Auker, Chairman, Shale Energy Committee

Task 1: Issues Position Paper Format Template

This position paper covers both the Southeastern Section and Lehigh Valley/Berks Section

Members and Non-members participating:

Lehigh Valley/Berks Section Members

- Shannon Rossman, Berks County Planning Commission
- Charlie Schmehl, Urban Research & Development Corporation
- Cheryl Auchenbach, Berks County Planning Commission

Southeastern Section Members:

- Jessica Noon, City of Philadelphia Water Department
- Christopher Lankenau, Urban Partners
- Carol Stauffer, Chester County Planning Commission

Context of the Section

1. **Counties**
   a. Southeastern Section – Bucks, Chester, Delaware, Montgomery, Philadelphia

   b. Lehigh Valley/Berks Section – Berks, Northampton, Lehigh

2. **Physical, Social, and Economic Characteristics**

   a. Southeastern Section – Bucks, Chester, Delaware, Montgomery, Philadelphia

      The Southeastern Section of Pennsylvania is highly diverse region including large areas of agriculture, woodlands, suburban neighborhoods, small towns, and the City of Philadelphia. Population densities range from approximately 660 persons per square mile in Chester County up to 10,700 in Philadelphia. Over the past decades, the region as a whole has experienced significant population growth, particularly in the suburban counties which grew an average of 7% between 2000 and 2010. Total population in the region is currently over 4.0 million people with an estimated increase of 206,000 between 2000 and 2015. This region includes a significant population of highly educated and prosperous residents which can come into play when pipeline projects are proposed in their communities.

   b. Lehigh Valley/Berks Section – Berks, Northampton, Lehigh

Berks County encompasses 864 square miles with a population of 411,442 (2010 Census). The County seat is the City of Reading, which is situated 56 miles northwest of Philadelphia. Its eastern neighbor is Lehigh County.

The Lehigh Valley, which includes both Lehigh and Northampton Counties, is a 730 square mile area located about 80 miles west of New York City and 50 miles north of Philadelphia. These cities and their surrounding markets areas exert strong economic, demographic and social impacts on the region. The population, as of 2010, was 620,471. There are 3 Cities within the Lehigh Valley; Allentown, Bethlehem and Easton.

Historically the Counties were settled by the Swedes, Scotch-Irish, Germans, English, Welsh, and French Huguenots. The majority of these settlers were involved with agriculture. Berks County is still a major agriculture producer. Continued growth and development saw the construction of canals, railroads and highways that supported the manufacturing of steel, cement, heavy trucks, auto bodies, specialty metals, hosiery, chemicals and batteries. With the significant changes from the beginning to the end of the 20th Century in economics and market patterns the Region is more highly influenced by the major cities and their surrounding market areas to the east, south and west of the Region and directly links to its growth, development and population changes. The Regions' employment growth, as a whole, has changed as demands change, from agriculture to manufacturing to services.

3. Brief history of gas related development (wells, pipelines, industry etc.)

a. Southeastern Section – Bucks, Chester, Delaware, Montgomery, Philadelphia

The Southeastern Section does not contain deposits of shale gas but is impacted by the proposed transmission pipeline infrastructure to transport shale gas products. Pipelines have been a part of the Southeastern Section's infrastructure for many years. In Chester County some of the pipelines date back to the 1930's where approximately 600 miles of natural gas and natural gas liquid pipeline corridors currently crisscross the county's 760 square miles. Much of pipeline infrastructure was installed when the county's surrounding Philadelphia were largely rural and where the pipelines were not in conflict with denser development. Many of these rural areas are now heavily suburbanized, creating potential conflicts when pipeline expansions are proposed.

After new drilling methods (fracking) allowed gas extraction to occur on a larger scale in the Marcellus shale areas of Pennsylvania, the addition of new pipelines, such as the Sunoco Logistics Mariner East 2 line, and the expansion of or repurposing of existing pipelines became an issue of municipal and public concern. As higher volumes of shale gas need to be transported to new refinery facilities in Marcus Hook and other destinations along the Delaware River in the Philadelphia area, the demand for expanding the pipeline infrastructure increased through Chester County. A similar situation exists in Delaware County, where existing and future pipelines - including the Mariner East 2 - entering from Chester County will transport shale gas through the county to Marcus Hook.

b. Lehigh Valley/Berks Section – Berks, Northampton, Lehigh

The Lehigh Valley/Berks Region is not known for any significant deposits of shale energy. The Region is known for its mineral deposits of iron-ore, trap rock, limestone, zinc and slate. These minerals supported the Steel Industry and still support the Cement and other industries. However, the need for gas to supply energy to the Regions' housing, manufacturing and show in the many pipelines that traverse the area. The Region is seeing expansion of existing pipelines and proposed new pipeline projects that take shale gas to larger markets and ports.

Berks County has the Ontelaunee Energy gas powered electric generation facility and a proposed 2nd electrical generation facility directly adjacent. Ember Clear is currently in the planning and permitting process to build another gas powered electric generation facility estimated to begin operation by 2018. Sunoco Logistics Mid-Stream Terminal for refined products, UGI LNG storage and refinement facility. There are 377 miles of transmission pipelines within Berks County. Sun Logistics is proposing to expand

their pipeline system that traverse the southern portion of the County and Texas Eastern has almost completed a loop system to expand their capacity along their whole pipeline between Texas and Pennsylvania.

Section Position on Key Categories

1. **Pipelines**

a. Pipelines - Opportunities & Issues

- Safety is the most common concern raised by landowners and residents near pipeline corridors and projects. This includes the fear of gas leaks and explosions.

- Communications between pipeline operators and the public is often an issue – some specific concerns are:
  - Operators using technical terminology that the public does not understand.
  - Notifications of pending activities go to landowners instead of renters or residents, which can cause confusion for those living on the affected property.
  - Because of replacements and expansions to lines, the age of the infrastructure is widely unknown.

b. Pipelines - Planning Recommendations

- Provide or require better means of communication between operators and the public. This is even more important when there is an incident, no matter the extant of the incident. Follow-up information should be disbursed in the community so that the public is aware of what happened, were there any impacts, and how was the incident mitigated.

- Provide a central state-wide pipeline office and website where interested parties can go to find out needed information.

- Fully fund the agencies that are responsible for pipeline inspections and safety enforcement.

2. **Land Use**

a. Land Use - Opportunities & Issues

- Landowners are often unclear as to the exact nature of the property rights that pipeline operators possess when the operators own a right-of-way, work space, or other development rights.

- Landowners need more education regarding leases and necessary safeguards.

- Municipalities are unsure of and, in some cases, misinformed about their ability to regulate pipeline infrastructure – include both the pipelines and associated aboveground structures.

- Landowners and residents are concerned about the impact of pipeline rights-of-way and easements on their property values and the resale of their homes.

- There are many environmental concerns during pipeline construction, including impacts to water quality, impacts to stream crossings, the loss of open space, and the removal of woodlands.

- Conservancies and Land Trusts which have protected thousands of acres in the county have a particular concern with pipeline activity and construction within their easements and land holdings.

- The impact of pipeline projects on agriculture uses and soils is a concern – productive agricultural operations can be disrupted and may not be the same after the project is finished.

- Concern with the potential impact on community facilities, such as schools and hospitals, particularly in regard to safety issues and places that are hard to evacuate, such as nursing homes and prisons. Also, some facilities have impacts that are far greater than other facilities, processing plants, storage, and compressor stations, for example.

- There is an increasing need to prioritize and choose which land to protect versus which areas are preferred for a new pipeline right-of-way. Often the choice is between natural, historic, and the already built environment.

b. Land Use - Planning Recommendations

- Create consistent state regulatory, safety, and siting standards for all types of pipelines – including gas and hazardous liquids pipelines.

- Involve the State Planning Board in the energy issues to provide direct input at the state level.

- Create a review process that includes more than the immediate proposed expansion, improvement or change to a pipeline. If the proposal will eventually affect more than one municipality, create a process that will bring all of the affected municipality(s) and County(s) to the table up front so that potential issues/impacts/opportunities are discussed prior final decisions are made. This would lead to the better design of the project overall and potentially correct setback issues, impact zone and other related concerns.

- Provide resources to municipalities so that they better understand what their role is in the pipeline review process and how they and their constituents can participate in public input portions of the pipeline review process. Conversely, provide information as to the limits of local governments and residents have in the review process.

3. **Social, Cultural / Community**

a. Social, Cultural - Opportunities & Issues

- Siting and construction of pipelines may impact historic resources and their historic context.

b. Social, Cultural - Planning Recommendations

- Ensure pipeline operators have the most current historic resource mapping and information as they plan new or expanded pipeline routes.

4. **Economic Development**

a. Economic Development - Opportunities & Issues

- No immediate economic benefit is seen by those communities where pipelines are being built or expanded. County residents and businesses do not have direct access to the gas and it is unlikely that will be a possibility due to the nature of transmission versus distribution lines.

- Natural gas that is currently being delivered in certain (not all) pipelines is an important economic benefit to the Lehigh Valley/Berks Region. The area has a number of businesses that are directly involved in providing natural gas to customers, such as UGI, there are facilities that need natural gas in order to operate, in addition to the provision of natural gas to buildings for heating purposes. All of these translate into jobs.

- Significant economic benefit could be seen in the Philadelphia Region if the energy resources are used within the region to support manufacturing and other economic development initiatives. If the majority of the energy is exported, there will be significantly less economic benefit to the region beyond the refinery activity.

- Many employees for pipeline related activities are brought from other areas and do not result in permanent new jobs.

b. Economic Development - Planning Recommendations

- Work with the economic development community to identify strategies, both short and long term, for increasing access to natural gas.

5. **Transportation**

a. Transportation - Opportunities & Issues

- While there are many issues associated with pipeline expansion, pipelines are the safest means of transporting shale products and by-products. However, when failures do happen, they have the potential to be catastrophic.

- Pipeline projects create impacts to roads and traffic patterns and can sometimes result in the creation of temporary roads and potential impacts on erosion, sedimentation, and water quality.

b. Transportation - Planning Recommendations

- Ensure that traffic issues are properly addressed during pipeline construction (through state, county, and municipal coordination) and that roads are properly restored after construction is completed.

- When a new pipeline, facility or other related project is proposed in the areas, such as South Eastern Pennsylvania, that are growing in population and density, require the developer to build the pipelines to a higher classification so that there are fewer safety issues and conflicts with future development.

Appendix 2: Central Section Position Paper

MEMORANDUM

Subject: American Planning Association – Pennsylvania Chapter (APA-PA)
Shale Energy Committee
Committee Task 1 – Sectional Issues Identification
Date: December 29, 2014
From: Dennis Auker, Committee Member Central Section - Coordinator
To: Committee Members of Central Section

Task 1: Issues Position Paper

This position paper covers the Central Section

Members participating:

- Dennis Auker, Auker Consulting
- Jerry Walls, Walls & Associates
- Stanford Lembeck, Penn State University
- Kurt Hausammann, Jr., Lycoming County Planning
- Tracey Vernon, Vernon Land Use
- Jamie Keener, HRG Engineering Inc.

Context of the Section

4. **Counties**
   Adams, Centre, Clinton, Columbia, Cumberland, Dauphin, Franklin, Juniata, Lancaster, Lebanon, Lycoming, Mifflin, Montour, Northumberland, Perry, Snyder, Union, York

5. **Physical, Social, and Economic Characteristics**

   The Central Section of APA-PA covers a very large area and can be characterized as the Susquehanna Valley Area. With the exception of Adams County, Centre County, Franklin County and Lebanon County, all of the other 14 counties are adjacent to the Susquehanna River or its major tributary the Juniata River.

   The northern most areas encompassing Centre, Clinton and Lycoming Counties have the vastest areas of forested land and associated gas development where outdoor recreation is a significant economic engine. The largest metropolitan areas and employment centers include State College in Centre County, Lock Haven in Clinton County, and Williamsport in Lycoming County.

   In contrast as you move south, agriculture and urban land uses become more dominant. Major urban employment centers include larger metropolitan areas such as Harrisburg, Lancaster, Lebanon, Gettysburg, Lewistown and Chambersburg. In these areas agriculture, heavy industry and government play a major role in the economic and social fabric.

6. **Brief history of gas related development (wells, pipelines, industry etc.)**

   Only four of the 18 Counties that make up the Central Section of the Pennsylvania Chapter have active unconventional wells. Those counties are Centre, Clinton, Columbia and Lycoming Counties. Lycoming has seen the most drilling activity and business development associated with shale gas development. Because of increased demands for gas and gas exports, pipeline development in the more southern counties is becoming a more important planning issue. Local pipeline controversies have recently surfaced in Lancaster and Lebanon Counties.

Central Section Position on Key Categories of Opportunities & Issues

6. **Pipelines**

a. Opportunities & Issues

- Many pipeline corridors exist and are being planned with associated benefits and associated impacts. Maximizing coordination between private industry and government will be important in trying to maximize the use of corridors for multiple functions rather than developing single function and possibly redundant pipeline corridors.
- Class One Gathering Pipelines are not regulated by PA PUC or by FERC. Moreover, those pipelines are owned by multiple competing companies. Consequently, there is no comprehensive database or mapping coverage of those pipelines. Lack of knowledge of exactly where those pipelines are routed poses potential safety and environmental hazards. The argument that mapping would open risk of terrorism is not valid since all those pipelines are marked with standardized visible markers.
- Proposed pipeline routing for Class One Gathering Pipelines is not required by State regulations, which precludes opportunities to revise the routing to avoid major detrimental impacts and protect sensitive water resources and ecosystems.

b. Planning Recommendations

- Existing and proposed pipeline corridors need to be mapped using GIS in order to provide accessible information and data that can be used to promote economic development initiatives and cooperative efforts to ensure public safety. Leadership needs to come from the state to promote a more uniform and comprehensive approach to GIS mapping of facilities throughout the state.
- Gathering Pipelines should be regulated by the PA PUC.

7. **Land Use**

a. Opportunities & Issues

- While lower energy costs can provide opportunities for economic development and community revitalization through reuse of abandoned or underused sites, gas development can also lead to land use related conflicts.
- We need to minimize the footprint of impact through the maximum use of previously disturbed areas including well pads and existing pipeline corridors by maximizing the number of wells per pad, and combining compressor stations with well pads.

b. Planning Recommendations

- We need closer coordination with industry to identify opportunities to effectively reduce land use conflicts including the development of appropriate ordinances referencing BMPs that can mitigate potential conflicts.

8. **Social, Cultural / Community**

a. Opportunities & Issues

- Gas development is very cyclical in nature but can provide additional tax revenues that need to get infused into the communities that are dealing with the impacts.
- Any additional revenues need to get back into the community for long-term investments in infrastructure including roads, water, sewer, parks, education and health care etc.

b. Planning Recommendations

- Because of the cyclical nature of gas development it is very important that counties have good planning capacity in order to develop and implement comprehensive plans that include growth corridors and infrastructure plans, and make effective use of capital investment programming.
- Strong planning capacity needs to be supported if counties are to effectively realize potential social and economic benefits of gas development.

9. **Economic Development**

a. Opportunities & Issues

- The expanded use of natural gas in order to lower energy costs needs to play a critical role in providing regions with a competitive advantage for job creation.
- We need to attract major gas users to increase job creation and facilitate reuse of existing industrial infrastructure.

b. Planning Recommendations

- Economic development and community revitalization programs need to be tied not only to job creation but also tied to the expanded use of Pennsylvania's natural gas and other home grown alternative energy resources.
- Every region or county should have long-term economic development strategies and identify at least one initiative that targets and facilitates industrial development of industries that must use natural gas for energy or in the production process.
- Strong planning capacity needs to be supported if counties are to effectively make appropriate infrastructure investments to facilitate economic development associated with the expanded use of natural gas.

10. **Transportation**

a. Opportunities & Issues

- While the gas industry has done a relatively good job at repairing roads damaged during the exploration and drilling process, over the long-term roads will need to be resurfaced and the role of industry in providing any additional resources for such long-term maintenance is unknown.
- The expanded demand for rail service to support gas development has led to additional investments in rail infrastructure which can provide a competitive advantage for regional economic development strategies.

b. Planning Recommendations

- A comprehensive assessment of long-term transportation infrastructure opportunities and needs should be undertaken in all counties to better understand the impact of gas development and the need for long-term transportation investments to support economic development strategies.

Other Central Section Comments Related to the Role of Good Planning

Category	Issue/Opportunity	Planning Recommendations	Other Comments
Planning	Good planning is essential to promoting job creation by maximizing the opportunity presented by lower energy costs associated with natural gas.	Funding needs to be restored to such programs as LUPTAP to facilitate development of good planning programs at the county and local municipal level. CCAP needs to be integrally involved in educating members about the need for investment strategies and capital programming to support economic development.	Communicate this effort to the Governor's Office of Policy and Planning so the need and the relationship are clearly understood. Without good county planning capacity, counties will not be able to meet the needs for wise investment strategies. This needs to be effectively communicated to CCAP. LDDs may be able to help meet planning capacity needs if funding is available.
Political Outreach	APA-PA should be the organization that can effectively help government leaders bridge the gap between industry needs and community needs.	APA-PA representatives should meet with government leaders to convey a comprehensive and coherent message coming out of the work of this Shale Energy Committee.	It is important that the legislative processes impacting program funding policy be tracked in order to better ensure that communities can maximize the benefits of programs.

Comprehensive Energy Policy	Pennsylvania has what may be referred to as an "***all of the above"*** Energy Policy. The ***Pennsylvania State Energy Plan: Energy = Jobs*** was released in January 2014. The Executive Summary notes the following: ***Pennsylvania's Energy Policy: All of the Above – and Below*** *Pennsylvania's energy policy is straight forward – All of the Above- and Below – reflecting our diverse energy portfolio. Home to abundant resources such as oil, natural gas, coal, nuclear, hydropower, wind, solar and other renewables, the Keystone State is a national leader in both energy production and resource diversity. This array of resources, paired with competitive energy markets, means affordable and abundant power delivered in a way that meets business needs.*	We need to sustain a comprehensive energy approach that utilizes all types of home grown Pennsylvania energy sources and to reduce dependence on foreign sources. This need and relationship to economic development needs to be communicated by the planning community to the Governor's Office of Policy and Planning.	Shale gas provides an opportunity to allow us to more effectively phase in a greater diversity of energy resources.
Constitution of the Commonwealth of Pennsylvania, Article I, Section 27	*"The people have a right to clean air, pure water, and to the preservation of the natural, scenic, historic and esthetic values of the environment. Pennsylvania's public natural resources are the common property of all the people, including generations yet to come. As trustee of these resources, the Commonwealth shall conserve and maintain them for the benefit of all the people."* Article 1, Section 27, of the PA Constitution must be a guiding principle for all planners as we work to promote and manage shale energy development for the benefit of all Pennsylvanians.	APA-PA needs an educational program addressing how Article 1 should impact planners.	The planning community and those who count on assistance from the planning community need to be educated about the role of Article I Section 27. Specific Illustrative Scenarios need to be integrated into such an educational program. Recent court decisions have placed more emphasis on this provision as it applies to all levels of government.

Appendix 3: Northeast Section Position Paper

MEMORANDUM

American Planning Association: Pennsylvania Chapter, Northeast Section

Committee Members

- Ray Stolinas, AICP - Bradford County Department of Community Planning & Mapping Services
- Mike Mrozinski - Pike County Community Planning
- Nicole Boling - Wyoming County Office of Community Planning
- Craig Rickard - Wayne County Planning
- Chris Barrett - Wayne County Planning
- Tom Shepstone- Shepstone Management Company, Inc.

Context of the Section

7. **Counties**
   Bradford, Carbon, Lackawanna, Luzerne, Monroe, Pike, Schuylkill, Sullivan, Susquehanna, Tioga, Wayne & Wyoming

8. **Physical, Social, and Economic Characteristics**
   The NE Section encompasses twelve counties over an 8,300 mi.^{2} area, roughly the size of New Jersey. Regions include the Coal Region, the Wyoming Valley, the Poconos and the Endless Mountains, not to mention both large and small urban hubs such as Wilkes-Barre/Scranton/Hazleton, East Stroudsburg, Honesdale, Jim Thorpe. Pottsville. Typical of other sections, land area limits interaction between members due to the time required to travel to and from these regions.

9. **Brief history of gas related development (wells, pipelines, industry etc.)**
   Gas-related development is fairly new to the region and has been fairly active in a limited area, primarily the Endless Mountains. At the turn of the century, anthracite coal dominated economics, transportation and the way of life throughout the Wyoming Valley and Coal Region and posed similar challenges that the Northern Tier is now experiencing. Natural Gas Development has been active solely in the Northern Tier for several reasons, including, but not limited to: predominance of the Marcellus Shale Play (thickness/maturity), location of existing interstate pipelines (e.g. Tennessee/El Paso), prevalent landowner subsurface rights and water resources outside of watershed moratoria. Gas related development began to flourish in the Northern Tier in and around 2007-2008 as the industry built a large capacity of supporting gathering lines, compressor facilities, metering stations, water withdrawals, impoundments, along with continuous well pad development. Rural roads have also improved over these years as a result of the natural gas industry investment into both local and state road upgrades. "Spin-off" industry and business are now beginning to realize the value of locating in close proximity to affordable natural gas resources and new ventures have looked at the Northern Tier as a region to propose small and large power plants, natural gas liquification and processing facilities and industry that utilizes natural gas in material development.

Section Position on Key Categories
(Note: Public Safety should be addressed in each of these)

11. **Pipelines**

    a. Opportunities & Issues

    - Interstate transmission pipelines have increased to tremendous capacities within existing right-of-way. A few new interstate transmission line have been built (e.g. MARC-1) through new right-of-way and impacted open space, forest and water bodies and natural features. These are the major

"super highways" for gas transmission to market and the eastern seaboard and considered essential infrastructure not only on the regional level, but also for potential local tap-ins.
- Local gathering pipelines have been placed by gas companies with little or no input from local and county government bodies and minimal input from the property owner.

b. Planning Recommendations

- Encourage gas companies to maintain and maximize use of existing right-of-ways, impacting less undeveloped undisturbed land and sensitive areas.
- Give local municipalities and/or counties responsibilities in administrative review of pipeline location along with guidelines toward proper setback from future development.
- Support legislation that mandates delivery of shape files to County Planning/GIS Departments for the location of both existing and new pipelines.
- Work with utility companies and communities desirous of natural gas service to take advantage of local commodities.

12. **Land Use**

a. Opportunities & Issues

- Lack of consistent land use regulations across municipalities makes it difficult to minimize development impacts related to the natural gas industry.
- Planners require a better understanding of natural gas related uses and apparent spin-off industry, especially impacts on local roads, rail lines, water, sewer and surrounding communities that may not be directly developing from the industry.
- Also, the potential compatibility/incompatibility with existing uses related to residential neighborhoods, environmentally sensitive areas, historic districts, etc.
- Initiate programs that monitor groundwater and surface recharge areas for all communities reliant on groundwater for domestic water supplies. Same holds true for air quality monitoring.

b. Planning Recommendations

- Provide outreach to local officials and industry representatives on coordinated land use planning (PA Wilds Design Guide).
- Establish basic planning training through a professional planning action team at little or no cost to unplanned, rural communities in order to avoid haphazard development during the boom and post-boom periods.
- Develop proven standards that dictate proper setbacks from typical and ancillary natural gas uses and acceptable noise levels to be achieved at various facilities (e.g. Pig Launch Facilities, Compressor Stations, Pipe Yards).
- Integrate natural gas development within new comprehensive planning documents at the county and municipal level.

13. **Social, Cultural / Community**

a. Opportunities & Issues

- Population influx of out-of-state workers and company representatives create both an opportunity for budding residential development and an increase stress on housing availability and rental costs.
- Temporary living quarters such as "Man Camps", Work Force Housing and RV developments become a common occurrence instead of conventional housing.
- Increase population in predominantly rural areas where the natural gas activity is located stresses emergency services (police, fire, ambulance), social service departments and local businesses.
- Opportunity for an increase in demographic diversity among local populations.

b. Planning Recommendations

- Monitor, publish and educate other communities based on experiences of municipalities and counties already dealing with natural gas development.
- Study the immediate effects of the need for increased housing and rental costs due to the influx of gas workers.
- Investigate long-term community uses for temporary housing facilities that may not be utilized after the boom.

14. **Economic Development**

a. Opportunities & Issues

- Availability of a workforce that is unfamiliar with natural gas related skill sets.
- How do counties and municipalities promote both natural gas development and tourism efforts in order to be congruent economic drivers?
- Promoting both short and long-term opportunities for job creation, especially with spin-off business and industry.
- New York State moratorium on horizontal drilling and hydrofracking may have both positive and negative effects for Pennsylvania.
- More people shopping, eating and utilizing services in rural population centers.

b. Planning Recommendations

- Work with industry representatives, local trade schools, colleges and universities on natural gas-based occupation curriculum.
- Provide revitalization incentives for rural downtown business districts that coincides with growth associated with natural gas.
- Capitalize on energy production potential and supporting employment industries including retail, service and lodging.
- Educate community and economic development leaders on the eventual boom-bust cycle and promote alternative business opportunities that tap into local utilization of natural gas.

15. **Transportation**

a. Opportunities & Issues

- Local roads were never designed or built for traffic consisting of drill rigs, water and sand trucks, hydrofracking apparatus, water tanks, etc.
- Pennsylvania weather coupled with heavy use on rural back roads created havoc on existing road surfaces and runoff during the freeze/thaw cycle.
- Natural gas industry realized that local roads cannot handle full-capacity, created congestion issues at “pinch points” and looked to existing railroad corridors to haul larger loads of pipe, material and sand to decrease traffic volumes.

b. Planning Recommendations

- Provide education to local municipalities and the natural gas industry on the process of posting and bonding roads, but also, on techniques to strengthen road surfaces and subsurfaces related to full depth road reclamation as an alternative.
- Involve the natural gas industry in providing input into the Long-Range Transportation process to coordinate drilling and pipeline activity with road and bridge improvement projects. Also, encourage the natural gas industry to determine priority routes within a region so that improvements can be made with private financial assistance.

- Provide long-term transportation planning assistance to those communities prone to congestion due to other factors not related to natural gas traffic related to over-development, aged infrastructure, poor traffic light management, etc.

Appendix 4: Northwest Section Position Paper

From: Dan Gracenin [dgracenin@mcrpc.com]
Sent: Friday, January 09, 2015 2:11 PM
To: Dennis Auker
Subject: RE: APA-PA Shale Energy Committee Reminder

Good Afternoon Dennis,

Because of the Holidays, vacation and busy schedule the NW section did not complete the position paper. The Board have a meeting yesterday and I relayed what occurred for the first meeting and what was being asked of us currently Based on the other regionally responses many of the concerns are similar to what are region is experiencing now and what we believe will occur in the future. The only statement that was received by me from the NW relates to educat and training concerns. The following is directly copied from an email:

Good Morning,
All of our best planning efforts mean very little without implementation. Local officials through conditional use hearings, land development review, and gas extraction, processing a man camp permitting must involve trained and capable planning review and implementing individuals.

Such training will require;
1. An understanding of facilities and the life cycle of gas extraction and delivery.
2. How to involve the public with early planning reviews.
3. Training must extend to local government bodies, planning commissions, permitting officials, and the general public.

Since non-conventional gas wells, processing and delivery are relatively new to Pennsylvania all municipal action mus be transparent to the public and educational information distribution is essential.

I am looking forward to the meeting next week and hope that we can narrow our group focus to items that we can immediately or in the near term complete. If you have any questions, please let me know.

Daniel Gracenin,
Mercer County Regional Planning Commission

Appendix 5: Southwest Section Position Paper

MEMORANDUM

American Planning Association – Pennsylvania Chapter, Southwest Section:

Committee members

- Joy M. Ruff
- Lisa Cessna
- Dennis Martinak
- Frank Mancini
- John Trant
- Shannon Debes
- Andrew Hartwell, Chair APA PA SW Section

Context of the Section

1. Counties Allegheny, Armstrong, Beaver, Bedford, Blair, Butler, Cambria, Fayette, Fulton, Greene, Huntingdon, Indiana, Somerset, Washington, Westmoreland

2. Physical, Social, and Economic Characteristics

The SW Section is diverse in each of these facets. The sheer size of the section limits interaction between members due to the time required to travel to and from certain areas. The SW Section includes the major metropolitan area surrounding the City of Pittsburgh to rural settings sitting squarely in the heart of the Appalachian Mountains.

3. Brief history of gas related development (wells, pipelines, industry etc.)

The advent of shale development began in Washington County in 2004 with the Renz Well drilled by Range Resources. With over a decade of experience, Washington remains a leader in shale activity. According to DEP figures, five of the top nine counties with active wells are in the Southwest Section.

Gas drilling is not new to this region. Some of the first gas wells were drilled in the mid to late 1800's in counties that make up our section.

Section Position on Key Categories

1. **Pipelines**

Pipelines are a critical piece of the shale pie. From gathering to transmission, pipelines must be considered as important infrastructure similar to water and wastewater conveyance and transportation.

The location of pipelines effect long-term development, which can be positive or negative. The ability to co-locate pipelines is not easily accomplished or not always desirable. Stormwater issues, fragmentation, and development goals are the key considerations that planners must address. 2

2. **Land Use** Shale development should be approached as any other development or land use. Communities need to have policies and procedures to address all aspects of development no matter if it is shale or a Methadone Clinic. As the power to regulate falls to municipal or county government,

plans and ordinances must be considerate of local needs and goals. Pennsylvania is so diverse that there is no one-size fits all solution.

Planners must advocate for communication be it within the community, across municipal boundaries, to county and state levels, and to the industry and regulatory bodies.
Planners must be cognizant of the regulatory authority that oversees shale development. It is multi-jurisdictional and not always well-coordinated.
Due to the regional nature of shale development, counties should be encouraged to take the lead to educate communities, engage with the industry and regulatory bodies, and share lessons learned.
Under the current legislative framework, Pennsylvania communities where shale development is occurring are receiving impact fees to offset local impacts. Planners should be working with elected officials to ensure that these dollars are wisely used.
The SW Section Shale Committee suggests that a statewide policy beyond the above statement is not necessary. Rather we propose the creation of a guidance document to be used by communities and the planning profession. Such a document might include the following information to address:
1. Understanding oil and gas development.
a. Conventional and unconventional
b. Aspects of development have different impacts and occur in different locations (ex. rural communities more likely to have wells, boroughs and cities more likely to have downstream)
c. Supply chain opportunities and challenges
d. Regulatory environment – local, state, federal
2. Identify regional differences
a. Wet gas/dry gas
b. Social, economic, political considerations
c. Infrastructure limitations (water, sewerage, transportation)
3. Understanding that regulations should take a holistic approach, provide model ordinance language to address
a. Permitted uses, special exceptions, and conditional uses
b. Stormwater
c. Setbacks
d. Performance standards
e. Wastewater retention pits
4. Provide guidance on:
a. Public meeting management, communication
b. Road impacts – permits, bonding, utility crossings
c. Regional cooperation
d. How to work with industry
e. Large scale land use impacts (ie. Cracker Plants, Gas Processing Facilities, etc.)
f. Housing needs
5. Identify resources and best practices
6. Explain and plan for the Impact Fee

Planning Recommendations for Responsible Shale Development - Southwest Section (01-08-16)

Critical Issue	State Planning Recommendations	Recommendations for planners (private, public, non-profit)
The expanded delivery and utilization of natural gas can provide low cost energy and basic resources for manufacturing and high tech industries thus potentially providing a competitive advantage for economic development and job creation in Pennsylvania.	**When and where appropriate, economic development funding programs should be targeted to the expanded utilization of natural gas.**	4. As appropriate, municipal/county comprehensive plans county should have an economic development strategy that identifies at least one initiative that targets and facilitates industrial development of industries that must use gas for energy or in their production process. Such initiatives should be coordinated through economic development agencies while planners should identify infill, redevelopment opportunities and infrastructure needs within their community. 5. Workforce agencies are best suited to programs that enhance/develop education and skills of the workforce that tie into the oil and gas exploration industry. It should be noted that Act 13 funds are currently available and/or are being used for implementing training programs to meet workforce needs.
Good planning capacity at the county and local level is necessary to facilitate private industry investments that can create local jobs in Pennsylvania.	**State funding is essential to support planning capacity at municipal and county levels and the restoration of financial and technical assistance should be included in future state budgets. The current DCED Municipal Assistance Program would be an acceptable avenue if expanded and sufficiently funded to support planning activities across the Commonwealth.**	1. A comprehensive assessment of long-term transportation infrastructure opportunities and needs should be undertaken in all counties to better understand the need for long-term transportation investments. In line with accepted planning principles, this should be part of a comprehensive plan and not specific to "gas development", which is typically short term and localized. Support enhanced/continued outreach by agencies such as PennDOT, PSATS regarding education on local bonding and posting. Companies and businesses of any industry, including the gas industry, should be asked to provide input into long range plans. 2. Population increases from temporary or permanent workers can stress housing, social and community service resources. Appropriate public agencies, NGO's and private sector professional organizations should jointly and systematically monitor and evaluate impacts over the long-term in order to adapt planning initiatives accordingly. 3. As required by existing statute, comprehensive plans should be updated to address infrastructure needs, which can include site and building reuse, and community revitalization. Such plan strategies should take into account impacts associated with development generally, including the specific impacts associated with any identified industry. 4. Recognizing the cyclical nature of the oil and gas industry, capital improvement plans should be adopted at the local and county levels and appended to comprehensive plans as appropriate. Examples

Critical Issue	State Planning Recommendations	Recommendations for planners (private, public, non-profit)
		of such plans already completed and adopted (e.g. Lycoming County) are available for review and reference.
Development associated with the shale gas industry such as well wells, gathering lines, compressor stations, transmission lines, etc. have potential to create land use conflicts, and stewardship and public safety concerns.	**An active and functioning State Planning Board should play a pivotal role in advising the Administration in developing and implementing a strategy to identify sound land use principles and promote effective communication between government and industry.**	1. Planners should support early coordination between industry and government to maximize use of pipeline corridors and encourage end use of natural gas at the local level. 2. Planning departments should develop appropriate GIS capacities and corresponding mapping to provide corridor level guidance and to direct development decisions. 3. The Federal and State governments have various regulatory responsibilities for oil and gas development and municipal and county coordination is required by regulation. Planners and public entities should become familiar with the regulatory framework if shale development is anticipated. 4. Emergency Management Agencies and first responders should play both proactive and reactive roles regarding the community safety associated with the industry. 5. Lack of appropriate and consistent land use regulations across municipalities makes it difficult to coordinate development to minimize negative impacts and maximize positive outcomes. County planning should take a leadership role in developing local planning capabilities. Planners should recognize that Act 13 litigation was brought about because municipalities felt that the state overreached their authority when structuring legislation to create consistency for shale development. To guide decision making and maximize shale development to benefit local communities, comprehensive plans should address oil and gas development opportunities, infrastructure associated, and downstream opportunities associated with the use of natural gas. 6. Planners should become educated about the various segments of unconventional gas infrastructure and the regulatory aspects that govern both the use and placement of oil and gas infrastructure (e.g. gathering, transmission, and distribution lines). 7. Much of shale development occurs as a contract between a business and private land owner (this also includes municipal, county, state and/or federal entities). Locations of infrastructure can be dictated by the desires of the land owner, which may not align with what planners would consider to be sound land use decisions. Planners must understand this framework and be equipped to provide educational resources and guidance as appropriate.

Critical Issue	State Planning Recommendations	Recommendations for planners (private, public, non-profit)
Shale development has the potential to provide positive benefits beyond economic development. Planners must become aware of current success stories and identify feasible opportunities to improve or increase conservation and recreational opportunities.	**In partnership with the shale industry, state and federal entities such as US Fish and Boat Commission, PA DCNR, the PA Game Commission along with conservation organizations, should work with private and public planning professionals to identify best management practices for recreational opportunities and habitat improvements.**	1. Public lands suitable for shale development should be assessed for recreational and/or habitat needs and opportunities. Washington County can serve as a benchmark for leasing public park lands to an Exploration/Production Company (Range Resources) with demonstrated success to improve habitat and recreational offerings. 2. Planners should work cooperatively with conservation/recreation groups and the oil and gas industry to identify opportunities for partnerships. The Montour Trail Council can serve as a benchmark to demonstrate a successful partnership with a Midstream Company (Mark West) and construction of a rail-with-trail.

Appendix 6: Planning Priorities Matrix

Planning Priorities Matrix (May 3, 2016) (Composite)

Key (See detailed descriptions on last page)

C = Central L/B = Lehigh / Berks NE = Northeast NW = Northwest SE = Southeast SW = Southwest

N = Not a Priority L = Low Priority M = Medium Priority H = High Priority Very High Priority = VH N/A = Not Applicable to Regional Conditions

Critical Issue	Key Planning Recommendations	Strategic Actions	Regional Priorities for Strategic issues & Actions					
			C	L/B	NE	NW	SE	SW
The expanded delivery and utilization of natural gas in Pennsylvania can provide low cost energy and basic resources for manufacturing and high tech industries thus potentially providing a competitive advantage for economic development and job creation.	**When and where appropriate, economic development funding programs should be targeted to the expanded utilization of natural gas.** **An active and functioning State Planning Board should play a pivotal role in advising the Wolf Administration on developing and implementing strategies that will make a positive impact on our communities. The promotion of sound land use practices and effective communication between government and industry should be on the State Planning Board Agenda.**	1. Economic development and community revitalization programs need to be tied not only to job creation, but also tied to expanded use of Pennsylvania's natural gas and other energy resources when feasible. 2. In order to expand job opportunities, workforce skills need to be tied to the potential expansion of regional business and industries. Regional educational resources need to be consistent with job potentials. This includes industries that develop and transmit energy resources or may use natural gas and/or its byproducts for energy or in the production processes. This will require continuous coordination between industry and the educational community. Workforce agencies are best suited to programs that enhance/develop education and skills of the workforce that tie into industry recruitment needs. It should be noted that Act 13 funds are currently available and/or are being used for implementing training programs to meet workforce needs 3. As appropriate, municipal/county comprehensive plans should address an economic development strategy that identifies at least one initiative that targets and facilitates development of industries that must use gas for energy and/or in their production process. Such initiatives should be coordinated with economic development agencies.	**VH** **VH** **VH**	**M/H** **H** **H**	**VH** **H** **H**	**H** **H** **H**	**M** **H** **H**	**VH** **M** **H**

Critical Issue	Key Planning Recommendations	Strategic Actions	Regional Priorities for Strategic issues & Actions					
			C	L/B	NE	NW	SE	SW
Planning capacity at the county and local level is necessary to facilitate public and private industry investments that can create local jobs in Pennsylvania.	**State funding is essential to support planning capacity at municipal and county levels. The restoration of financial and technical assistance should be included in future state budgets. The current DCED Municipal Assistance Program or any other future program would be an acceptable avenue if expanded and sufficiently funded to support planning activities across the Commonwealth.**	1. Recognizing the cyclical nature of the oil and gas industry and the fluctuating impact on local revenues, communities need to have long-term investment strategies. A comprehensive assessment of long-term infrastructure opportunities and needs should be undertaken. The findings should be incorporated into the Comprehensive Plan and the associated implementation strategies specifically accounted for in a Capital Improvement Program. This approach will help facilitate appropriate investments in infrastructure like energy, transportation, water, sewer, parks, public safety, human resource services and education all of which impact on public and private investments that create jobs.	**H**	**H**	**H**	**H**	**VH**	**VH**
		2. The Pennsylvania Municipalities Planning Code requires that municipal and multi-municipal comprehensive plans be reviewed every ten years and that county comprehensive plans are updated every ten years. However, local municipalities and counties should update plans to address issues associated with development generally as well as impacts arising from any industry specifically, including the energy industries.	**VH**	**H**	**H**	**H**	**VH**	**M**
		3. Population increases from temporary or permanent workers can stress housing, social and community service resources. Appropriate public agencies, non government organizations and private sector professional organizations should jointly and systematically monitor and evaluate impacts over the long-term in orde***r*** to adapt planning initiatives accordingly.	**M**	**N/A**	**H**	**H**	**N/A**	**M**
		4. Planning departments should develop appropriate GIS capacities and corresponding mapping to provide corridor level guidance and to direct development decisions	**M**	**M**	**M**	**M**	**H**	**M**

Critical Issue	Key Planning Recommendations	Strategic Actions	Regional Priorities for Strategic issues & Actions					
			C	L/B	NE	NW	SE	SW
		5. Shale energy development provides opportunities to realize benefits unavailable prior to development. Through cooperative efforts between industry, government agencies, and non-government agencies, planners should ensure that any environmental improvements associated with shale energy development (e.g. habitat enhancement, recreation improvement, pollution abatement, and land and habitat conservation) are realized.	**M**	**M**	**M**	**M**	**L**	**M**
Development associated with the shale gas industry such as wells, gathering lines, compressor stations, transmission lines, etc., have potential to create land use conflicts, and environmental stewardship and public safety concerns. Effective coordination between industry and government is the cornerstone to appropriately addressing such concerns.	**An active and functioning State Planning Board should play a pivotal role in advising the Wolf Administration on developing and implementing a strategy to identify sound planning principles and promote effective communications and coordination between government and industry.** **Article 1, Section 27 of the Pennsylvania Constitution often referred to as the Environmental Rights Amendment, should always be one important guiding principle as should all articles of the Constitution and other applicable laws in the development and implementation of strategic actions.** **The Pennsylvania**	1. Shale gas development is cyclical by nature. Thus, the Pennsylvania State Planning Board needs to address this issue by including representative membership that can both advise the administration and help facilitate state policy implementation.	**VH**	**H**	**M**	**M**	**H**	**M**
		2. Foster early coordination between industry and government. Such coordination may help to maximize use of pipeline corridors for multiple functions when appropriate.	**VH**	**VH**	**H**	**VH**	**VH**	**H**
		3. The Federal Government and the Commonwealth should coordinate and clarify regulatory responsibilities to ensure that all types of gas lines are appropriately regulated. Those regulatory responsibilities need to be clearly communicated to the planning community and the public so that the regulatory process can be better understood by those impacted.	**H**	**VH**	**H**	**VH**	**VH**	**H**
		4. Gas line safety is a critical issue warranting clear and comprehensive communications between industry and local communities including all affected stakeholders. This is especially important in more urbanized areas. Accurate information needs to be provided to both planning and public safety agencies. Emergency management agencies are critical partners in the implementation of effective communications.	**H**	**VH**	**M**	**H**	**VH**	**M**
		5. County Planning should play a support role in education. Generally, education associated with optimizing land use and the protection of the public health and welfare relative	**H**	**M/H**	**M**	**M**	**H**	**M**

Critical Issue	Key Planning Recommendations	Strategic Actions	Regional Priorities for Strategic issues & Actions					
			C	L/B	NE	NW	SE	SW
	Municipalities Planning Code (Act 247 of 1968) must remain the foundation for land use regulation at the local, county, multi-municipal, regional and/or interstate levels.	to any industry (including shale development) would be within the realm of county planning. It is important that planners understand the relationship between the private property owner and the industry and the role it plays in land use decisions.						
		6. Consistent land use regulations across municipalities can help facilitate coordinated development to minimize negative impacts and maximize positive outcomes. In this regard county planning should take a leadership role in assisting local government address local planning capabilities and promote cooperative efforts among municipalities to help facilitate consistent and cost effective regulation.	**VH**	**H**	**M**	**M**	**H**	**H**
		7. Inter- departmental coordination is critical and should be guided by Pennsylvania Keystone Principles previously established by prior administrations to promote sustainable economic development and conservation of resources through a coordinated interagency approach.	**H**	**H**	**H**	**H**	**M**	**H**

KEY

VH: Very High Priority – Essential and should be focused on immediately since inaction may significantly compromise effectiveness in the future.

H: High Priority – should be focused on in the short term and is considered essential for long-term success.

M: Medium Priority – should always be considered and maintained on the agenda for future action since it may contribute to long-term success.

L: Low Priority – something to consider but currently viewed as having limited significance to long-term success.

N: Not a Priority – Currently, this issue or action is not seen as being of any significance in this region in regard to effectively realizing the benefits of shale energy development.

N/A: Not Applicable