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Cover Photo: A view across the Unalaska Bay, May 2014
Credit: Ryan Scherzinger
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INTRODUCTION
In May 2014, the American Planning Association (APA), through its professional institute, the American Institute of Certified Planners (AICP), organized a Community Planning Assistance Team (CPAT) project in Unalaska, Alaska. Unalaska is the seventeenth community to participate in APA’s Community Planning Assistance Teams program.

The project was selected from proposals submitted during CPAT’s June 2012 community application review cycle. Erin Reinders, AICP, Planning Director for the City of Unalaska served as APA’s primary community liaison throughout the effort. City Manager Chris Hladick and other City staff members also served as important contacts and valuable resources for the team throughout the project.

This report presents the CPAT’s findings, observations and recommendations for the residents and stakeholders of Unalaska, Alaska.

THE PURPOSE OF THE CPAT INITIATIVE
The purpose of the Community Planning Assistance Team (CPAT) initiative is to serve communities with limited resources by helping them address planning issues such as social equity and affordability, economic development, sustainability, consensus building, and urban design, among others. By pairing expert urban planning professionals from around the country with residents and other stakeholders from local communities, the initiative seeks to foster education, engagement, and empowerment. As part of each team’s goals, a community develops a vision that promotes a safe, ecologically sustainable, economically vibrant, and healthy environment.

APA staff works with the community, key stakeholders, and the host organization(s) to assemble a team of planners with the specific expertise needed for the project. The team meets on-site for three to five days, during which time a series of site visits, focused discussions, and analysis are performed. On the final day, the team reports their results back to the community. A more detailed report is issued to the community at a later date.

GUIDING VALUES
APA’s professional institute, the American Institute of Certified Planners (AICP), is responsible for the CPAT initiative, which is a part of APA’s broader Community Assistance Program. Addressing issues of social equity in planning and development is a priority of APA and AICP. The Community Assistance Program, including the CPAT initiative, was created to express this value through service to communities in need across the United States.

Community assistance is built into the professional role of a planner. One principle of the AICP Code of Ethics and Professional Conduct states that certified planners shall aspire to “seek social justice by working to expand choice and opportunity for all persons, recognizing a special responsibility to plan for the needs of the disadvantaged and to promote racial and economic integration.” Another principle is that certified planners should aspire to “contribute time and effort to groups lacking in adequate planning resources and to voluntary professional activities.”

PROGRAM BACKGROUND
In recognition of the key role urban and regional planners play in shaping vibrant, sustainable, and equitable communities, the APA Board of Directors established the “Community Planning Team” initiative in 1995. This initiative resulted in a pro bono effort to assist an economically struggling African American community in Greensboro, North Carolina. APA has continued to develop a pro bono planning program that provides as-
Another Community Assistance Program initiative is the Community Planning Workshop, which is held in the host city of APA’s National Planning Conference every year. The workshop is a one-day event that engages community leaders, citizens, and guest planners from around the country (and abroad) in discussing and proposing specific solutions to urban planning challenges. Workshops typically begin with an introduction of individuals involved and a tour of the community, neighborhood, or site. Participants form breakout groups that begin by discussing existing issues, then participants brainstorm new ideas based on community needs and sound planning techniques. Each breakout group “reports out” on its results to the entire group. Facilitators then lead a discussion to form consensus around future goals and ways to achieve these goals. Upon the conclusion of the workshop, the local community composes a final report that incorporates workshop results and specific actions that local officials could take to turn the project vision into reality.

In 2005, program efforts were increased after Hurricane Katrina in the Gulf Coast region to include a number of initiatives and projects in the affected cities of Henderson Point, Mississippi, and Mandeville, Slidell and New Orleans in Louisiana. Another Gulf Coast recovery project included the Dutch Dialogues, which brought American planners together with Dutch experts to transform the way that Louisiana relates to and manages its water resources.

AICP broadened the scope of the CPAT program with its 2009 project in Buzzard Point, a neighborhood in Southwest Washington, D.C. Over the course of the site visit, the team met with more than 40 neighborhood groups, government agencies, residents, and other stakeholders. The team advised community leaders on long-range strategies to strengthen existing and proposed transit links and increase accessibility, improve affordable housing developments, position the area as a major gateway to the city, and to deal with industrial areas within the neighborhood.

The last several years of completed projects in Matthews, North Carolina; Story County, Iowa; Maricopa, Arizona; Wakulla County, Florida; Dubuque County, Iowa; La Feria, Texas; Franklin, Tennessee; Augusta, Georgia; and Lyons, CO are important landmarks in the development of the CPAT program. They mark the inauguration of CPAT as an ongoing programmatic effort. The initiative will increase in scope and frequency in coming years, becoming an integrated part of APA’s service, outreach, and professional development activities.

More information about APA’s Community Assistance Program and the Community Planning Assistance Teams initiative, including full downloadable reports, is available at:

www.planning.org/communityassistance/teams
EXECUTIVE SUMMARY

This report documents the May 17-23, 2014 Community Planning Assistance Team (CPAT) visit to Unalaska, Alaska. This section of the report summarizes the Team’s activities; interaction with local stakeholders; review of related information; and conclusions pertaining to the City’s request.

The City applied for CPAT assistance in a detailed proposal. The primary objective was to help the City with their land use planning process, including the support of their continued preparation, additional research and community outreach, and the reporting of those findings. The CPAT’s work will help set the stage for City staff as they move into developing the Land Use Plan that direct goals and policies for future growth and development of the community. The Land Use component is a key element of the Comprehensive Plan as it is intertwined with all other components and includes provision for policy that address the following:

- Economic development;
- Health & well-being;
- Quality of life;
- Physical appeal;
- Environment;
- Education, art, culture and entertainment;
- Housing;
- Land use, transportation, and infrastructure; and
- Values and actions, such as:
  - Increasing housing options;
  - Making land available for businesses and industry;
  - Broadening and diversifying the economy;
  - Keeping environment pristine; and
  - Protecting natural and historic resources.

The City’s proposal specifically requested that the CPAT should engage the community in an intensive process of stakeholder focus groups and meetings with the overall population in order to assess the following key issues:

- How should community outreach be conducted throughout the planning process to keep everyone involved?
- What could be the major impacts of the potential evolution of the community as future development associated with oil and gas industry uses?
- How can current and future housing needs be met through public and private initiatives?
- What locations for new port facilities, residential development, community services and facilities should be considered in the plan; and
- What measures should be considered for environmental, cultural and historic protection assets.

The proposal included a detailed agenda for the CPAT that outlined meetings, interviews, tours, and work sessions during the team’s visit. Erin Reinders, AICP, Unalaska’s Planning Director, orchestrated a full schedule for the team to meet with the majority of the key leaders of the local government and business organizations, as well as educators, social service providers, and property owners.

The City of Unalaska is a unique place in geography and location, its environment, its economy and its people. As City Manager Chris Hladick said when we arrived: “Unalaska is a town of 4,500 on steroids.” This is true. The
dynamics of Unalaska are extremely impressive to visitors. The resident population increases significantly several times per year depending on the fishing industry activity. Constant arrival of ships bringing goods to the city and transporting fish products keeps the port facilities fully operational 24 hours a day, 7 days a week. Construction of facilities is happening everywhere. The marine environment and climate produce ever-changing conditions of rain, sleet, and snow, combined with extreme wind events, that make outside activities challenging.

Unalaska has excellent community facilities including schools, recreation facilities, a library and a medical clinic. Private businesses have extensive investments in port-side facilities, processing and cold storage facilities, employee housing, and visitor accommodations. Local museums feature the colorful history of the region dating from early Aleut peoples’ activities and the US government’s use of the Island during World War II.

The City has an aggressive program of infrastructure investment including power, water, wastewater system improvements, new docks, and road improvements involving more than $100 Million. The Ounalashka Native Corporation owns most of the area’s land and is poised to participate in local community development in a number of key areas. The pending advent of the oil and gas industry’s use of Unalaska to support Chukchi and Beaufort Sea exploration in the Arctic Ocean and eventual transshipping of products could bring another wave of very significant development to Unalaska.

Each of the following sections of this report include the Team’s findings, conclusions, and recommendations regarding how the City should proceed with the preparation of the Land Use Plan.

- The “Project Overview” sets the stage for the Team’s work by describing how things got started and the physical landscape that the Team was to assess;
- The “Methodology” section describes the intensive series of meetings, public events, media contacts, and stakeholder interviews that were conducted. This section includes recommendations for future public involvement during the update of the Land Use Plan;
- The “Future Growth and Development” section includes maps illustrating the Team’s synthesis of current conditions and future projected demands for land uses and respective ideas for locations of future development;
- The “Potential Impacts of the Oil and Gas Industry” describes existing conditions of Unalaska’s important location, its marine terminals, users, and services, and assesses the area’s locational suitabilities for future terminals on the basis of 17 site criteria;
- “Housing Needs and Opportunities” are evaluated here to consider current issues, future needs, and potential strategies for increasing the supply. An analysis of the current Housing Plan leads to conclusions for integration of the Housing Plan’s goals and strategies into the Comprehensive Plan;
- The “Comprehensive Plan Land Use Element” section is an assessment of the current format and content of the Element with recommendations for continuing the update process as informed by the Team’s findings, conclusions, and recommendations.
PROJECT OVERVIEW

City of Unalaska Planning Director Erin Reinders, AICP submitted an application to APA’s CPAT program in June 2012. After official selection, work on the Unalaska project began in the fall of 2012. Roger Wagoner, FAICP was selected to lead the team of volunteer planners.

A conference call was held between Erin Reinders, AICP (Planning Director), Chris Hladick (City Manager), Roger Wagoner, FAICP (CPAT leader), and APA staff member Ryan Scherzinger to discuss the project. While most CPAT projects include a preliminary visit by the team leader and APA staff, it was decided to consolidate the project into one visit due to the remoteness of Unalaska and consequent high cost of travel between Anchorage and the island. Wagoner and Scherzinger worked to identify other team members to fill the expertise needed for the project. The other team members selected included: Shelly Wade, AICP (Anchorage, AK) with a strong background in community engagement with rural Alaskan communities; Greg Easton (Seattle, WA), a land economist with previous experience working in Alaska; Majid Yavary (Toronto, ON), a marine engineer/port planner with expertise in the oil and gas industry; and Tom Kurkowski (Fairbanks, AK), a geographic information systems (GIS) specialist and the Operations Lead for the Scenarios Network for Alaska and Arctic Planning (SNAP). Please refer to the Meet the Team section on page 55 for more information on each team member.

Prior to the visit, the team studied background materials, held conference calls, and worked with Erin Reinders and her staff to prepare for the visit. The team leader, Roger Wagoner, and APA staff member, Ryan Scherzinger, arrived in Unalaska on Saturday, May 17, a day ahead of the team to meet with City staff and get acquainted with the geography of Unalaska. The rest of the team arrived on Sunday, May 18, except for Shelly Wade who was delayed in Anchorage. She joined the team in the early afternoon on Monday, May 19.

Monday morning, May 19, the team met with Erin Reinders at the library to set up their work space at the public library. KUCB (Unalaska Community Broadcasting) Radio interviewed Wagoner and Scherzinger about the project during their morning broadcast. The team later met with City department directors for lunch at City Hall, then embarked on a tour of the community with Reinders; Chris Hladick, the City Manager; and Peggy McLaughlin, the Director of Ports and Harbors. Following the tour, the team prepared for a public open house, designed to engage community members and foster discussions about the future of Unalaska. The open house was held at the Burma Road Chapel.

The public was encouraged to attend and discuss their ideas and vision for Unalaska. Specific questions asked of community members were organized around two themes: (1) existing land use; and (2) future land use. Since the existing land use map was based on only a “windshield survey” (i.e., by simple observation), the questions asked were: (a) what needs to be corrected? (b) what needs to be added? And, of course, (c) any other concerns or questions? For future land use, the team asked, “What areas should be:” (a) conserved or preserved (e.g., cultural, historical, environmental significance); (b) available for business or industries (type? location?); and (c) available for housing (type? location?). Team members invited residents to discuss Unalaska’s future with them (and each other) and place sticky notes on a variety of maps with their specific ideas.

On Tuesday, May 20, the team held stakeholder interviews with small groups, including: city development review staff; the Ounalashka Corporation; community organizations; fish processing companies; cargo companies; fuel and logistics companies; marine and tug pilots; the U.S. Coast Guard; and local businesses.

On Wednesday, May 21, the team met in the morning to discuss what they’d learned from the previous two days. Then, Shelly Wade and Erin Reinders engaged three separate high school classes. Each group provided their thoughts and ideas about Unalaska. The remainder of the team went on a guided boat tour with the Director of Ports and Harbors, Peggy McLaughlin and other City staff. The tour allowed the team an opportunity to experience Unalaska from the water and the important perspective it provides. McLaughlin gave
background information and pointed out the different ports, fishing industry operations, storage areas, and other coastal land uses. The group also discussed potential issues associated with increased sea vessel traffic. The full team reconvened in the afternoon for sharing and further discussion. That evening, the team split up again, with one group conducting public outreach at the Community Center, and the other at the local grocery store.

The team met the next morning on Thursday, May 22, then visited the Museum of the Aleutians. They enjoyed a tour of the facilities and discussed the museum with Executive Director Zoya Johnson. Following the museum visit, the team met for lunch with Mayor Shirley Marquardt, along with Reinders and Hladick. The team then met back at the library to prepare for the final open house with the community later that evening.

For the final open house on Thursday evening, held at the Community Center gymnasium, the team displayed all of the maps with community input allowing attendees to see what ideas everyone had shared throughout the week. For further analysis and input, the team also created a new map illustrating the areas where most people suggested particular land uses. The open house allowed community members to see what others had suggested throughout the week and offer additional feedback and new ideas.

On Friday, May 24, the team met in the morning to discuss the final report and writing assignments moving forward. They met with City staff again before departing for Anchorage in the early afternoon.

**BACKGROUND**

Unalaska is the 12th largest incorporated city in the state of Alaska and is located about 800 miles southwest of Anchorage in the Aleutian island chain. Located just 50 miles from the Great Circle shipping route, Unalaska is in the heart of the North Pacific/Bering Sea fisheries (see Map 1 below). The City contains approximately 115 square miles of land and 98 square miles of water. The community is a vibrant mix of industry and history connected by 27 miles of roads linking the port, harbors, and private docks with local businesses and a resident base of around 4,500 with another 5,000 to 10,000 seasonal workers.

For the last 30 years, Unalaska’s economy has been based primarily on commercial fishing, seafood processing, fleet services, and maritime transportation. The Port of Dutch Harbor is the only deep draft, ice-free port from Unimak Pass west to Adak and north to the headwaters of the Bering Straits, along the entire western coast of Alaska. The port is designated a “port of refuge” and provides year-round protection for disabled or distressed vessels. Ground/warehouse storage and transshipment opportunities are also available for the thousands of vessels that fish or transit the waters of the Bering Sea.

While there is a vast amount of undeveloped land on the island, there is a limited amount of flat ground readily accessible for development. Many property owners or lease holders blast rock or fill tidelands to create additional developable areas. Strategic and sustainable land use in Unalaska must consider the concerns and desires of all community members along with environmental factors, economic needs, historical and cultural meanings, and best practices in planning.

New economic opportunities with significant land use implications are confronting Unalaska. There is the possible advent of cargo shipment over the pole via the Northern Sea Route. In addition, and much more immediately, with external plans already underway, the oil and gas industry has its eye on Unalaska as a strategic staging area related to Arctic oil exploration and production. A number of support industries related to oil and gas as well as cargo will also have an impact on Unalaska’s future.
Map 1: The Aleutian islands are an 1,100-mile volcanic archipelago. Unalaska, the 12th largest city in Alaska, is located 800 miles southwest of Anchorage in the Aleutian island chain. The North Pacific Great Circle Route, a major international shipping corridor crosses within 50 miles of Unalaska and the Port of Dutch Harbor as ships head through Unimak Pass in the heart of the Bering Sea/North Pacific fisheries. Thousands of ships traverse the Great Circle Route every year. *Created by CPAT member Tom Kurkowski*
Map 2: The CPAT focused on two areas. The first, highlighted in purple, is Unalaska’s developed core and nearby areas feeling current development pressure. The second focus area, outlined in black, is Unalaska’s city limits, which encompasses a much broader region, including areas that may feel development pressure in the future. *Created by CPAT member Tom Kurkowski*
METHODOLOGY

THE PROCESS, TOOLS, & KEY OUTCOMES
The Unalaska CPAT conducted a combination of research and public engagement activities to prepare for and execute a robust five-day plan for the May 2014 Unalaska Land Use Plan public engagement effort. The CPAT used the City’s land use plan public engagement objectives, as well as a detailed, five-day charrette schedule as a starting point for developing specific tools. The team worked closely with Unalaska’s Planning Director Erin Reinders, AICP, and staff Planner Anthony Grande, to devise and revise each tool. Below is a brief description, including some outcomes, for each preparatory and onsite public engagement tool.

LITERATURE REVIEW & CONVERSATIONS WITH PLANNING DIRECTOR
A first step in the planning process was to gain a basic understanding of past and current issues regarding land use in Unalaska. Key to this method was reviewing and synthesizing past and current planning documents for the region, and follow-up conversations with the Planning Director. The project team worked with City staff to attain and review the following core documents:

- 2014 Commercial and Residential Property Rent Survey
- 2013 12th Annual Assessment of City Services
- 2011 Unalaska Comprehensive Plan
- Current Land and Ownership Maps
- 2011 Housing Strategy
- 2009 Port of Dutch Harbor Development Plan

City planning staff also made available other relevant land use planning documents including current and proposed changes to City planning and land use development code (Title 8), and trip reports from a 2012 visit to Port Fouchon, Louisiana, where staff observed and learned from a community that successfully supports the interests and needs of both fishing and oil industry stakeholders. All documents were made available prior to and during the CPAT site visit via an online file-sharing service.

CPAT CONFERENCE CALL
The CPAT met once as a whole group via teleconference to prepare for the five-day site visit to Unalaska. The team conducted a short review of existing background materials and also brainstormed potential land use topics, as well as anticipated stakeholder comments, questions, and concerns. The team also discussed potential focus group and workshop materials needs. This information was shared with Planning Director Erin Reinders, AICP, who secured the necessary items for the team’s work.

ONE-ON-ONE PHONE CONVERSATIONS
To gain resident, property owner, and other stakeholder perspectives on land use and issues, the project team conducted a series of informal one-on-one telephone conversations with City staff, including Reinders and City Manager, Chris Hladick. APA staff member Scherzinger also contacted several members of the APA Alaska Chapter and other state contacts in both the public and private sectors to discuss details of the project.

COMMUNITY SITE VISIT
The community site visit began on Monday, May 19th. Please see the full week’s schedule in Appendix A for an overview of the CPAT’s public engagement activities. Outlined below is a detailed description of specific activities, and where available, a snapshot of key outcomes.
**City Staff Presentations & Community Tour**

After brief introductions and a presentation of current City land use and other community and economic development issues, challenges, and opportunities from City Manager Chris Hladick, the CPAT embarked on a community tour to see first-hand existing facilities and land uses including, but not limited to: harbor and port facilities, housing (of all types, including new developments), public utilities, commercial uses, and parks and recreation. The community tour provided the CPAT with a visual picture of current land use challenges and opportunities, and also gave the team the opportunity to learn from and informally interview key City staff, including Ports and Harbors Director Peggy McLaughlin and Assistant City Manager Patrick Jordan.

**Team Check-ins, Debriefs, & Planning Sessions**

Throughout the five-day site visit, the CPAT held multiple formal and informal team check-ins with City staff to review proposed processes and materials for each public engagement event. City staff provided, as needed, background materials, new maps, and continued to network with key stakeholders and community leaders to invite them to stakeholder meetings and community workshops.

**One-on-One In-Person Interviews**

CPAT member Shelly Wade and Planning Director Erin Reinders conducted an informal interview with Frank Ketly, a long-standing resident and community leader, and current City Natural Resource Analyst, to get his thoughts on existing challenges, opportunities, and future land use in Unalaska. The interview was held during lunch at the Senior Center. Team members also had a number of quasi-formal, semi-structured conversa-
On the second day of the site visit, the CPAT met with eight stakeholder groups representing different community interests, including:

- City development review team, comprised of City department directors and key planning staff (five participants);
- Ounalashka Corporation Staff and Board Members (six participants);
- Community groups and faith-based organizations (six participants);
- Fish processors (three participants);
- Cargo or cargo-related industry representatives (two participants);
- Fuel and logistics industry representatives (three participants);
- Marine pilots and tug operators, including U.S. Coast Guard (six participants); and
- Local business owners (one participant).

After a short introduction of the project’s purpose and the objectives of the stakeholder meetings, a general
set of guiding questions was asked of all stakeholder groups, with content-specific or stakeholder-specific questions as needed. General guiding questions included, but were not limited to, the following:

• What is your role in the community and what are your biggest comments, questions, and concerns about land use in Unalaska?
• Do you own land in Unalaska? How do you manage that land? What are your current land policies? Can you give an example of a recent transaction?
• Are there specific areas that concern you and/or your organization/entity? Where are they? What is the specific challenge and/or opportunity?
• How are you currently working with the City and other organizations on land use issues?
• From your perspective, what is the biggest land use challenge/opportunity in Unalaska?

Some paraphrased excerpts from the stakeholder focus groups are outlined below. The excerpts reflect key themes heard during other public engagement events, including conversations with high school students and other local residents during the community open houses.

• “Need utilities and road improvements to support port development in Captain’s Bay.”
• “There are approximately 50 land use/permit applications a year; there is virtually no plan review or inspections as part of the permit process.”
• “The City shouldn’t build housing.”
• “Development costs are high – driven by industry projects.”
• “Would like to do more housing, but it’s tough and City subdivision requirements are a constraint.”
• “Low income housing is not feasible.”
• “Need housing for singles and single parents.”
• “A pavilion for meetings with kitchen near the schools on city land would be good.”
• “UniSea doesn’t anticipate much expansion, but support businesses like housing, storage, boat maintenance and supply should expand.”
• “More cold storage is needed.”
• “Oil/gas industry will increase competition for dock space.”
• “Demand is there for more small processors doing value-added processing.”
• “Need lay-down space for containers.”
• “Better airport service and telecommunications are needed for any future industry development to be considered.”

Youth Engagement

On the third day of the site visit, CPAT member Shelly Wade and Planning Director Erin Reinders worked with Unalaska High School Government Teacher Jeff Dickrell to engage young people and get their feedback on the future of Unalaska. Three high school government classes, over 30 students, participated. Each class was approximately one hour. Using maps of the community, students were asked to share their ideas about future land use development in Unalaska.

Image 7: High school students shared their ideas for future land uses. Photo by Ryan Scherzinger
Students were provided approximately five broad land use categories, including: retail/other businesses; fishing industry; housing; oil and gas/other resource development; parks and recreation; and environmental (which included places that should be protected/not developed for cultural, environmental, historical and subsistence purposes). In small groups of three to five, students marked maps to indicate existing and future land uses using the broad land use categories listed above. Students then presented the results of their small groups’ discussions to the whole class.

During these one-hour sessions, students also informally discussed their thoughts on current challenges and opportunities to future land use development, and sometimes, shared their thoughts on how to address perceived community/organizational conflicts. In general, student ideas reflected the results of conversations with adult community members. Specifically, the key concern from youth was the need for more and improved housing. Youth also had a number of ideas for recreational opportunities, including specific thoughts on hiking, biking, and all-terrain vehicle (ATV) trails and parks. Unalaska’s youth frequently identified housing as the key land use challenge, strikingly similar to adult members of the community. Youth also expressed the desire for more developed recreational trails and businesses that are within walking distance of the school and/or their homes.

Port Focus Tour
While part of the CPAT was facilitating conversations with local youth, other team members participated in a boat tour of port facilities. Since much of the City’s holdings include water (98 sq. miles), the boat tour provided an important vantage point to understand land use in relation to the sea. During the tour, City staff pointed out areas of potential high traffic for ships and narrow channels, a notable consideration with the likelihood of increased oil and gas, shipping, and other maritime-related activities. Staff pointed to potential land sites for the oil and gas industry and discussed the challenges associated with them. The CPAT toured existing industries along the coastline including fish processing companies, cargo operations, warehouses and storage, salvage and rescue, fueling stations, and port facilities. The tour also included views and discussions of the U.S. Coast Guard station, boat harbors, a docked NOAA research vessel, container ships, tugs, floating processors, fueling docks, and natural habitat.

Images 8 - 10: The CPAT toured Unalaska by boat to gain a better understanding of the ports, harbors, and channels associated with the fishing and shipping industries. Photos by Ryan Scherzinger
Community Open Houses

During the five-day public engagement event, the CPAT worked with City planning staff to conduct two community workshops. Both workshops were designed in an open house style to give community members the space and time needed to review relevant maps and to have one-on-one time with CPAT members and City staff to provide feedback, ask questions, and express any concerns. More detail on each workshop follows:

Open House #1
The first open house was held on Monday, May 19th, the first evening of the five-day public engagement project, at the Burma Road Chapel. The CPAT set up different stations including existing land use maps and a set of guiding questions aimed at getting initial feedback from community members. CPAT members facilitated the stations and prompted community feedback with the following questions:

Regarding existing land use (using the recently revised land use map as a tool):
- Did we get it right?
- What corrections do you have?
- Any additions?
- Comments, questions, concerns about the map?

Regarding future land use (using the recently revised land use map as tool), what areas should be:
- Conserved or preserved (have cultural, historical, environmental, and/or other significance)?
- Available for business and industries? What type and location?
Available for housing? What type and location?

32 community members participated in the first open house. Participants answered the guiding questions by writing on the maps with markers and/or sticky notes. The goal was to get community feedback on the “what” and “where” land use could happen, while also providing an accurate picture of current land use policy and ownership status.

Participants also shared their ideas verbally with the CPAT. When applicable, those ideas were captured in writing on the land use maps. Key themes from the first open house included: (a) a need for more and improved housing; (b) a need for more and improved pedestrian walkways and recreational trails; (c) continued support and prioritization of any/all fisheries-related infrastructure; (d) need for a more diverse set of support and other types of businesses, including fisheries-related businesses; and (e) specific ideas for where future oil and gas development should happen.

Open House #2

The second open house was held on Thursday, May 22nd, the last evening of the land use public engagement series, at the Community Center Gym. The goal of the second open house was to share and get clarification on the cumulative results and key themes from the week’s activities, including all stakeholder meetings and other community outreach, and to collect any other ideas that had not been captured. To prepare for the second open house, the CPAT and City planning staff developed a set of preliminary maps that provided a summary of what we heard over a four-day period of meeting with different stakeholders and recording the community’s ideas for future land use. The maps included the category and preferred location of specific land uses including: housing, conservation/recreation, commercial services, and industrial (see Map 3 on page 22).

For the open house, the first open house maps and maps from youth engagement and other community outreach were displayed on a long “gallery walk” in the center of the gym for the community to review at their own pace. Along the gym walls, the CPAT set up individual stations with the “results maps” showing preliminary future land use ideas based on the week’s conversations with different community stakeholders and a similar set of guiding questions as posed during Open House #1, including:

Regarding future land use (using recently revised land use map as a tool), what areas are potentially good locations for:

- Conservation, preservation, subsistence?
The stations also had an excerpt from the City’s 2020 Comprehensive Housing Plan that listed “Priority Housing Sites”.

To kick off the open house, CPAT member Shelly Wade and Planning Director Erin Reinders provided a brief overview of the project, the week’s events, CPAT member introductions, and instructions for the evening’s event. A welcome table at the entrance provided attending participants with additional background materials and a comment sheet with contact information for providing additional feedback. Approximately 50 com-
Community members participated. The event immediately preceded a USO show, also held in the gymnasium, which generated additional traffic as people showed up early for the performance.

**On-Site Outreach at “Community Hubs”**

On the third evening of the CPAT visit, two groups of CPAT members equipped with base maps and guiding questions, similar to those used during the first open house, set up information and community feedback stations at two key community locations: the Community Center gym lobby and the open area in front of the checkout stands at the Safeway grocery store. The time, approximately 6:00 to 7:30 p.m., and locations were identified as those places and times when and where a high volume of community members would frequent. The idea was to potentially get feedback from residents that do not always attend community meetings and those residents that may not belong to a specific key stakeholder and/or interest group. Over the approximately hour and a half timeframe, CPAT members talked with another 20-25 community members and gathered feedback on the desired future land uses and location for those uses. These information outreach stations were also an opportunity to share project details and to encourage community members to provide their feedback, either during the next day’s open house or through calling or emailing the City planning staff.

**Local Media**

The City planning staff employed all local media to share information and encourage community participation in the land use public engagement series and to educate residents on the land use planning process. Some examples of media outreach include:

*KUCB, The Exchange, Guest Interview*

On March 19th, 2014, Planning Director Erin Reinders was a guest on the local public radio station’s program, *The Exchange*, where she gave an overview of the CPAT project and the land use planning process in Unalaska. The show is available online at:  

*KUCB, AM Unalaska, Guest Interview*

On the morning of May 19th, the first day of the team’s visit, team leader Roger Wagoner and APA staff member Ryan Scherzinger were guests on the local public radio station program, *The Exchange*, where they gave an overview of the CPAT, discussed the importance of public participation in the planning process, and encouraged residents to attend the scheduled open houses during the week and engage the team with issues and ideas they felt were important.

![Image 20: CPAT leader Roger Wagoner, FAICP speaking with KUCB producer Vic Fisher in the studio before a live radio interview. Photo by Ryan Scherzinger](image.png)
Additional actions performed by City staff included: issuing press releases; posting flyers; a fax blast; and informational posts on the City website and Facebook page, the KUCB events page, and Channel 8 Rolodex.

On the third evening of the site visit, May 21st, CPAT member Shelly Wade co-hosted a local community events and information show with Planning Commissioner Chair Chris Bobbitt. Shelly and Chris gave an overview of the land use public engagement project, shared results of what had happened to-date, and invited the community to attend the Thursday, May 22nd open house.

The success of the five-day CPAT visit was in no small part due to the hard work and commitment of the City of Unalaska planning staff. Erin Reinders and Anthony Grande did a tremendous amount of work preparing for the CPAT visit and also provided their assistance, guidance, and recommendations throughout the team’s time in the community.

FUTURE PUBLIC ENGAGEMENT

- **Specific populations/stakeholder outreach**
  There were a number of specific community/stakeholder groups, including business leaders, cargo or cargo-related industry groups, and seniors, which we did not reach during our visit, or who were not well represented during focus group conversations. These groups need face-to-face time with City planning staff to express their ideas and concerns regarding future land use in Unalaska.

- **Continued dialogue with the Ounalashka Corporation, other landowners, and major businesses**
  If possible, and especially through the development of the land use plan and specific policies, scheduling regular face-to-face conversations with these groups would help to build a necessary foundation of open and consistent communication, and trust, between the City and key landowners and business. There was a strong desire by a number of stakeholders to continue the same type of small group discussions and forum for sharing concerns and asking questions that happened during the May CPAT visit.

- **Kiosks/displays in more “community hubs”** with maps, tools for marking up maps, and information on how residents can stay involved, and how and when they can provide feedback.

- **Continued work with youth**
  Consider a higher level of involvement with youth. Work with high school teachers and students to develop and present their ideas about the future of Unalaska to the Planning Commission and other City and community leaders.

- **Community site tours with local residents**
  So many people are busy with their lives, they have not taken the time to visit and actually observe the space/land around them. As was done for the CPAT, consider providing City-run community tours to observe and dialogue on current land use (and other) challenges and opportunities. Potentially pay a local business to run the tours, and even giving participants some sort of incentive (e.g., $50 gift card) for sharing their observations in a Planning Commission or City Council meeting.
FUTURE GROWTH & DEVELOPMENT

The Team considered the information and statements of local officials, property owners, businesses, and other informants. The following maps illustrate the areas that were considered for future development for growth of uses including port development, municipal facilities, residential development, and other land uses.

Maps 3-6: Enlarged versions of these maps are presented on the following pages. Source: City of Unalaska with modifications by CPAT member Tom Kurkowski
Community Themes Map: These broad themes specific to actual locations were developed and defined by the community of Unalaska. The CPAT gathered thoughts, insights, opinions, and wishes of the community through several public meetings, listening sessions with a wide variety of stakeholders, as well as conversations with community leaders. The circles can be interpreted as an attempt to map the overall sentiment of the community. They are a guideline to allow the community to better plan for future land use decisions.

Map 3: Community themes derived from input during community engagement process. Created by CPAT member Tom Kurkowski
Map 4: This is a zoomed in version of Map 3. Created by CPAT member Tom Kurkowski
Community Themes & Current Land Use Map: This map shows the agreements and disagreements with what the community of Unalaska defined as preferred land use in the area as defined through the community themes, versus what is actually occurring on the ground as defined by current land use data. Note that the community themes are a very broad classification, while the current land use is much more specific and may have several designations that fit well into a single community theme. This map can be used to help the community visualize how their preferences align with current land use and how to guide future development.

Map 5: Community themes and current land use comparison. Source: City of Unalaska with modifications by CPAT member Tom Kurkowski
Community Themes and Current Land Use

Map 6: This is a zoomed in version of Map 5. Source: City of Unalaska with modifications by CPAT member Tom Kurkowski
POTENTIAL IMPACTS OF THE OIL & GAS INDUSTRY

DESCRIPTION OF EXISTING MARINE TERMINALS & SERVICE

The island of Unalaska is positioned in a geographically advantageous location for a number of reasons. The Port of Dutch Harbor is located to the south of Amaknak Island and Unalaska Bay (see Map 7). Unalaska Bay opens to the Bering Sea. Despite its northern location, the Port of Dutch Harbor is generally ice free year round.

Map 7: A navigational chart of Unalaska and its surroundings (cropped to focus in on the CPAT study area). Source: NOAA Chart 16528
The Port and its approaches are naturally deep. The only constraint to navigation is the 6.75 fathom deep bar, which currently restricts the draft of vessels calling the port.

The Island of Unalaska is located near the Great Circle Route connecting marine transport of cargo and goods between East Asia and North America (see Map 8). Port of Dutch Harbor is less than 0.5 day sail away from the Great Circle Route and is the only large and modern port between Anchorage and Asia.

Map 8: The North Pacific Great Circle Route. Source: City of Unalaska

Image 21: A container ship approaching from Unalaska Bay. Photo by Ryan Scherzinger
Despite its remote location, Dutch Harbor is a very active port with a large number of vessel movements, the vast majority of which support the fishing industry. Figure 1 shows vessel traffic in and around Dutch Harbor between January and April 2013.

Figure 1: Vessel traffic in and around Dutch Harbor January through April 2013. Source: Marine Exchange of Alaska
Dutch Harbor is regularly serviced by mainline container vessels. Horizon Lines has a weekly scheduled call using their Jones Act compliant D7 vessels. Service originates and terminates at Tacoma and extends to Anchorage, Kodiak, and Dutch Harbor.

Maersk Lines has a weekly call at the Port of Dutch Harbor as part of its TP5 route (Transpacific 5). This service recently changed its service for increased efficiency and Dutch Harbor is visited twice as it travels westbound to Yokohama, Hakata, Busan, Dalian, Qingdao, then eastward back through Dutch Harbor.

APL has also a weekly US Flag service between North America and Asia that calls at Dutch Harbor. APL’s Central China 3 (CC3) service initiates at San Pedro (California) and the port rotation includes the following calls: Oakland, Dutch Harbor, Yokohama, Busan, Naham Qingdao, and Shanghai.

Efficient port operations require the availability of adequate backreach to support the quayside operations. At Unalaska Marine Center (UMC) one of the key constraints is the availability of backreach in the existing port. Due to the geological nature of the island, very little flat land is available, particularly near the coast. At the port of Dutch Harbor, most of the backland has been carved out of the hillsides, which is a costly and time-consuming undertaking. To overcome this challenge, several satellite container storage yards as well Container Filling Stations (CFS) have been established outside of the port perimeters; containers are moved to and from the port as needed. This creates some inefficiencies in an otherwise well-run operation, but in the absence of backland represents the best option available.

With the ever-growing size of container vessels as the container lines focus on maintaining schedule and limiting the duration of port calls, increasing port productivity through increased land use in close proximity to docking facilities will become a critical issue for the Port in the future, i.e., increasing the number of container moves per hour.

In addition to major container lines, the Port of Dutch Harbor is serviced by barges for inter-island transshipment. Finally, Dutch Harbor is also a port of call for U.S. Coast Guard cutters patrolling the Arctic.

The island of Unalaska is serviced by a number of private and public marine terminals and facilities. Nearly all private docks serve the fishing fleet and are located alongside fish processing and packaging plants. In 2008, a new dock was also constructed by DH Ports LLC (a joint venture between American Seafoods and Pacific Stevedores) along the northwestern shore of Dutch Harbor to support Kloosterboer cold storage facility. Other large existing marine terminals or facilities that are in commercial use are listed below (Source: http://www.ampilots.com/documents/2013_General_Port_Parameters.pdf):

- **Light Cargo Dock**: The dock face is about 140 feet, but can accommodate vessels with an overall length of 350 feet due to the presence of breasting dolphins that extend the berthing face to 370 feet. The local pilots report the facility can accommodate vessels with a maximum draft of 25 feet.
- **Terminal 1**: This facility is also referred to as the Old Western Pioneer dock. The dock is reported to have a 960-foot face and can accommodate vessels with an overall length of about 900 feet with a maximum draft of 40 feet.
- **Magone Shipyard**: This is a private facility that can accommodate vessels with overall length of 480 feet and can accommodate vessels with a maximum draft of 40 feet.
- **United States Coast Guard Dock**: This dock consists of two positions and can accommodate vessels with an overall length of up to 520 feet and a maximum draft of 38 feet.
- **Unalaska Marine Center (UMC) Dock**: This facility has five different positions and following the planned replacement of positions number three and four, can accommodate vessels in excess of overall length of 1,000 feet with a maximum draft of 39 feet.
• **Delta Western Fuel Dock**: This dock can accommodate vessels with an overall length of 600 feet and a maximum draft of 30 feet.

• **American President Lines (APL) Dock**: This terminal can accommodate vessels with an overall length of 965 feet.

• **East Channel/Iliuliuk Harbor**: This facility can accommodate vessels with an overall length of 420 feet. The maximum water depth is 22.5 feet.

• **Coastal Dock**: This facility can accommodate vessels with an overall length of 308 feet and a maximum draft of 19.5 feet.

• **Westward Seafood’s Dock, North Pacific Fuel Dock, OSI Main Dock, OSI South Dock, and OSI Reef Dock** are all located within Captains Bay.

Fuel tankers are a growing issue. With markedly higher activity, there are an increased number of calls for fuel tankers, which currently call from Delta Western, Kloosterboer, and UMC. Fuel operations do not require the amount of backreach as other industries, but the effects on land use are cumulative. The presence of fuel operations impacts cargo and fishing operations that do require significant land use.

**OPTIONS FOR SUPPORTING THE OIL & GAS INDUSTRY’S ANTICIPATED PORT FACILITIES NEEDS**

Oil and gas related facilities are generally purpose-built and tend to be designed to meet specific users’ stipulated needs and requirements. In addition, the oil and gas industry has very stringent safety and security requirements that tend to exceed those adopted at other marine facilities. As such, long-term use of existing marine facilities by oil and gas-related marine traffic is not feasible. In addition to the aforementioned considerations, the use of existing facilities to support the oil and gas industry could displace or limit the access of the current users, which is not an acceptable option considering the near capacity utilization of the currently existing marine terminals and the importance of the fishing sector to Unalaska's economy.

**Potential Sites**

During the CPAT’s site visit, an overland tour of the southern coastline of Captains Bay was carried out on May 19, 2014. A boat tour of the UMC Port and Summer, Iliuliuk, Captains, Nateekin, Broad, and Wide Bays was carried out on May 21, 2014. During the boat tour, the team was accompanied by the Harbor master, Port Manager, and an Alaska marine pilot. The team visited possible areas that could support oil and gas exploration.

Prior to the site visits, a series of site selection criteria were developed based on criteria previously used in identifying suitable locations for oil-and-gas-related marine developments. Using the criteria, combined with the information gathered from the site visits, bathymetric charts, City of Unalaska, interviews conducted with various officials and stakeholders, and other data gathered during the course of the team’s visit, an assessment of each site is provided in *Table 1*. 
Map 9: Six sites, highlighted above, were assessed for their suitability as it pertains to oil and gas industry development. NOAA Chart 16528 (modified)
Seventeen criteria (and seven sub-criteria) are used to address each of the six sites.

1. Navigational (a critical first concern for port development)
2. Natural hazards (ice, exposure to waves, wind, visibility, seismicity, tsunami risk, and geotechnical constraints)
3. Availability of adequate water depth or ability to dredge economically
4. Availability of flat land
5. Access to utilities
6. Proximity to populated areas
7. Access to pipeline
8. Land and air access
9. Environmental constraints
10. Archeological Importance
11. Site elevation (need for cut and fill)
12. Availability of existing infrastructure
13. Distance to nearest commercial port with national and international access
14. Specific security issues
15. Tenure of land
16. Proximity to exploration area
17. Availability

Based on the assessment (see Table 1), all available sites offer advantages as well as challenges for the development of a facility to support Arctic oil and gas exploration. Additional in-depth studies are needed to identify the most suitable location. Such studies should consider the full range of logistic, ecological, social, environmental, and economic issues in the determination of potential development sites.

Image 22: Land at the end of Captains Bay is one of several potential development areas for oil and gas industry operations, all of which pose particular challenges and require further studies. *Photo by Ryan Scherzinger*
<table>
<thead>
<tr>
<th>SELECTION CRITERIA</th>
<th>SUMMER BAY</th>
<th>ILIULIUK BAY</th>
<th>CAPTAINS BAY</th>
<th>NATEEKIN BAY</th>
<th>BROAD BAY</th>
<th>WIDE BAY</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Navigational</td>
<td>Relatively easy access. No significant hazards to navigation could be identified in the charts.</td>
<td>Relatively easy access. No significant hazards to navigation could be identified in the charts. A shoal about 6 and 3/4 fathoms deep is located in the middle of the bay. This will restrict the draft of the deepest vessel.</td>
<td>Access to the bay is through a relatively narrow gap ranging in depth between 8 to 14 fathoms. A number of buoys are provided in the Bay to accommodate trampers in demurrage or in between hires. When fully occupied, these moorings significantly reduce the width of the navigational channel. Vessels requiring pilotage may experience limited access during certain weather conditions due to safety concerns.</td>
<td>Relatively easy access. No significant hazards to navigation could be identified in the charts.</td>
<td>Relatively easy access. No significant hazards to navigation could be identified in the charts. A mooring buoy is identified in the bay.</td>
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### TABLE 1 continued

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<th>SELECTION CRITERIA</th>
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<tr>
<td>2. Natural hazards</td>
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<tr>
<td>A. Ice</td>
<td>Ice Free.</td>
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<tr>
<td>B. Exposure to waves</td>
<td>No protection against waves from the Bering Sea and Unalaska Bay. Wave conditions are expected to be energetic.</td>
<td>Relatively sheltered from Bering Sea and Unalaska Bay. Will experience diffracting swells and some locally-generated seas. Most sheltered location after Captains Bay.</td>
<td>Most sheltered location. Climate dominated by locally-generated seas.</td>
<td>Exposed to waves from the northeast.</td>
<td>Similar wave climate to Nateekin Bay.</td>
<td>The northern part of the bay is protected against direct Bering Sea wave exposure by a land spit. The spit may not be sufficient to provide adequate protection against diffracting swells.</td>
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<tr>
<td>C. Wind</td>
<td>Equally exposed to wind. Wind climate at some locations may be more severe due to direct exposure or orographic factors. Sufficient site-specific information is not available to rank sites.</td>
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<tr>
<td>D. Visibility</td>
<td>Sufficient site-specific information is not available.</td>
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<tr>
<td>E. Seismicity</td>
<td>Sites are located within the same seismic zone.</td>
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<tr>
<td>F. Tsunami risk</td>
<td>Setting aside a tsunami due to locally generated landslides, due to their northern exposure, all sites are well sheltered against far-field generated tsunamis. In terms of locally-generated tsunamis, the actual probability of occurrence of such an event requires to be studied, but all sites, with the exception of Captains Bay, are exposed to minimal risk. Captains Bay, due to its geometry and surrounding topography, has the potential of being more exposed, although actual risk, which is expected to be quite small, can only be determined after further analyses.</td>
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<tr>
<td>G. Geotechnical constraints</td>
<td>Adequate site-specific geotechnical data is not available to identify constraints. Generally speaking, the rock is expected to be igneous rock and sedimentary rock derived from igneous rocks. In the nearshore areas of the bays, mineral sand can be found overlaying the bedrock.</td>
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<th>WIDE BAY</th>
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<tbody>
<tr>
<td>3. Availability of adequate water depth or ability to dredge economically</td>
<td>Any onshore facility would require dredging. Depending on the dredging depth, rock dredging may be required, which would be very cost-prohibitive. It is conceivable that a facility could be constructed here without the need for dredging (i.e., a jetty extending from the shore to the deep water thereby eliminating the need for dredging). The feasibility of such an option depends on the actual needs of the project.</td>
<td>According to the navigational chart, relatively deep water can be found fairly close to the shoreline. It is known that a reef exists at APL and Rocky Point. Geotechnical studies support dredging to 40-45 feet depending on depths. Further studies are likely needed as dredging may have mixed results here.</td>
<td>Adequate water depth can be found immediately off the shoreline along the eastern and western coasts of the Bay. Water depth is reduced in the southern end of the bay. A shore-connected facility in the southern end of the bay will involve dredging. Although no site-specific geotechnical information is available, dredging could be difficult as depending on dredging depth rock will be encountered.</td>
<td>Water depth is relatively deep along the eastern and southern coasts of the bay and a facility can be developed there without any dredging. Water is shallower along the western coast and some dredging may be required if a facility is to be constructed there. Although no site-specific geotechnical information is available, dredging could be difficult as depending on dredging depth rock will be encountered.</td>
<td>A relatively wide 1-fathom-deep bench is identified immediately offshore of the shoreline. Water depth is shown to drop quickly to over 4 fathoms deep offshore of this bench. It is conceivable that a facility could be constructed here without the need for dredging.</td>
<td>Water depth is relatively deep even very close to the shoreline. It is conceivable that a facility can be developed here with minimal or no dredging.</td>
</tr>
<tr>
<td>4. Availability of flat land</td>
<td>With the exception of Morris Cove, very little flat land can be found near the coast.</td>
<td>Nearly no naturally flat land is available near the coastline.</td>
<td>Most flat lands can be found at the southern end of the Bay. Little naturally flat land can be found along the eastern and western coasts of the Bay.</td>
<td>Naturally relatively flat land can be found along the southern portion of the bay.</td>
<td>Naturally relatively flat land can be found along the coastline.</td>
<td>Some naturally relatively flat land can be found along some portions of the bay.</td>
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<tr>
<td>SELECTION CRITERIA</td>
<td>SUMMER BAY</td>
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<tr>
<td>5. <strong>Access to utilities</strong></td>
<td>Currently, no access to existing utilities, but overland access can be arranged.</td>
<td>All primary services are through to Kloosterboer. Additionally, there are phone lines to the spit and fuel lines to Kloosterboer. Located close to the City’s power plant.</td>
<td>Some service exists.</td>
<td>Currently, no access to existing utilities.</td>
<td>Currently, no access to existing utilities.</td>
<td>Currently, no access to existing utilities.</td>
</tr>
<tr>
<td>6. <strong>Proximity to populated areas</strong></td>
<td>Located in an unpopulated area and relatively far from existing populated areas, but accessible via road.</td>
<td>Located close to existing populated area. Accessible via road.</td>
<td>Located in an industrial area and relatively close to existing populated area. Accessible via road.</td>
<td>Located in an unpopulated area. Access to populated area via sea only.</td>
<td>Located in an unpopulated area. Access to populated area via sea only.</td>
<td>Located in an unpopulated area. Access to populated area via sea only.</td>
</tr>
<tr>
<td>7. <strong>Access to pipeline</strong>*</td>
<td>None of the sites are located on or near any pipeline right of way.</td>
<td>None of the sites are located on or near any pipeline right of way.</td>
<td>None of the sites are located on or near any pipeline right of way.</td>
<td>None of the sites are located on or near any pipeline right of way.</td>
<td>None of the sites are located on or near any pipeline right of way.</td>
<td>None of the sites are located on or near any pipeline right of way.</td>
</tr>
<tr>
<td>8. <strong>Land and air access</strong></td>
<td>Air access is through Dutch Harbor airport. Land access to the site is available.</td>
<td>Air access is through Dutch Harbor airport.</td>
<td>Air access is through Dutch Harbor airport. Land access to the site is available.</td>
<td>Air access is through Dutch Harbor airport. No land access to the site is available; only by sea and helicopter.</td>
<td>Air access is through Dutch Harbor airport. No land access to the site is available; only by sea and helicopter.</td>
<td>Air access is through Dutch Harbor airport. No land access to the site is available; only by sea and helicopter.</td>
</tr>
<tr>
<td>9. <strong>Environmental constraints</strong></td>
<td>Pristine area. A detailed environmental assessment needs to be carried out.</td>
<td>Near an existing industrial area as well as City’s waste disposal site. Perhaps the most already-impacted site. A detailed environmental assessment needs to be carried out.</td>
<td>Near an existing industrial area. However, the southern portion of the Bay is a spawning ground. A detailed environmental assessment needs to be carried out.</td>
<td>Pristine area. It is understood that streams flowing into the bay are spawning grounds. A detailed environmental assessment needs to be carried out.</td>
<td>Pristine area. It is understood that streams flowing into the bay are spawning grounds. A detailed environmental assessment needs to be carried out.</td>
<td>Pristine area. A detailed environmental assessment needs to be carried out.</td>
</tr>
</tbody>
</table>

*Pipeline is defined here as all parts of those physical facilities through which liquids, slurry, or gas moves in transportation, including pipe, valves, and other appurtenance attached to pipe, compressor units, metering stations, regulator stations, delivery stations, holders, and fabricated assemblies.*
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</tr>
</thead>
<tbody>
<tr>
<td>10. Archaeological importance</td>
<td>Fortifications from the Second World War could be observed. A more detailed investigation is needed.</td>
<td>Unclear. A more detailed investigation is needed.</td>
<td>Burial grounds were observed at the southern end of the bay. Other archaeologically-relevant artifacts may be present. A more detailed investigation is needed.</td>
<td>A more detailed investigation is needed.</td>
<td>A more detailed investigation is needed.</td>
<td>A more detailed investigation is needed.</td>
</tr>
<tr>
<td>11. Site elevation (need for cut and fill)</td>
<td>It is envisaged that extensive cutting and filling will be required.</td>
<td>It is envisaged that extensive cutting and filling will be required.</td>
<td>Some cutting and filling will be required.</td>
<td>Some cutting and filling will be required.</td>
<td>Some cutting and filling will be required.</td>
<td>It is envisaged that extensive cutting and filling will be required.</td>
</tr>
<tr>
<td>13. Distance to nearest commercial port with national and international access</td>
<td>Closest commercial port is that of Dutch Harbor. Access to port via land is available.</td>
<td>Closest commercial port is that of Dutch Harbor. Access to port via land is available.</td>
<td>Closest commercial port is that of Dutch Harbor. Access to port via land is available.</td>
<td>Closest commercial port is that of Dutch Harbor. No overland access is available.</td>
<td>Closest commercial port is that of Dutch Harbor. No overland access is available.</td>
<td>Closest commercial port is that of Dutch Harbor. No overland access is available.</td>
</tr>
<tr>
<td>15. Tenure of land</td>
<td>Ounalashka Corporation is the primary landholder. Further analysis is needed to determine where native allotments or other owners may be involved.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>16. Proximity to exploration area</td>
<td>All sites are equally remote.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>17. Availability</td>
<td>Availability is dependent on various factors pertaining to land ownership and cooperation between owners.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
HOUSING NEEDS & OPPORTUNITIES

Housing availability and affordability are identified as an important challenge to the residents and employers in the community. Housing types and locations will be a key part of the update to the City’s land use component of the Comprehensive Plan. The subareas for housing in the Housing Plan are shown in Map 10. This chapter provides a discussion of market and development conditions in Unalaska, an identification of issues and potential responses, and a discussion of how this relates to the goals and strategies in the existing Housing Plan.

Images 23-29: Photographs of different housing stock and a demonstration of the building challenges related to the topography in Unalaska. Photos by Ryan Scherzinger
Map 10: Unalaska’s Comprehensive Plan identifies each of the subareas for housing on Amaknak and Unalaska islands. 
Source: City of Unalaska Comprehensive Plan - Housing Plan (2011)
MARKET & DEVELOPMENT CONDITIONS
The housing challenges in Unalaska are related to the size of the community, its remote location, the seasonality and transient nature of its economic base, and the severe climate. Specific market and development conditions are considered in this section.

POPULATION & HOUSEHOLDS
The housing market in Unalaska responds to unusual population and household conditions. As shown in Table 2, 48% of the 4,376 population according to the 2010 federal census resides in group quarters. There are 927 households with an average size of 2.46. Only 227, or less than 25%, of the households are in owner occupied units. The heavy reliance on group quarters and rental units is even greater in the peak fishing seasons when the local population increases by 5,000 to 10,000 people.

<table>
<thead>
<tr>
<th>TABLE 2: POPULATION, HOUSEHOLDS, &amp; HOUSING TENURE</th>
</tr>
</thead>
<tbody>
<tr>
<td>POPULATION (2010)</td>
</tr>
<tr>
<td>In Households</td>
</tr>
<tr>
<td>Group Quarters</td>
</tr>
<tr>
<td>Total</td>
</tr>
<tr>
<td>OCCUPIED HOUSING UNITS (2010)</td>
</tr>
<tr>
<td>Owner Occupied</td>
</tr>
<tr>
<td>Renter Occupied</td>
</tr>
<tr>
<td>Total</td>
</tr>
<tr>
<td>AVERAGE HOUSEHOLD SIZE</td>
</tr>
<tr>
<td>Owner Occupied</td>
</tr>
<tr>
<td>Renter Occupied</td>
</tr>
<tr>
<td>Total</td>
</tr>
<tr>
<td>HOUSING CHARACTERISTICS</td>
</tr>
<tr>
<td>Owner Occupied</td>
</tr>
<tr>
<td>Single Family Detached</td>
</tr>
<tr>
<td>Single Family Attached</td>
</tr>
<tr>
<td>Duplex</td>
</tr>
<tr>
<td>3/4 Plex</td>
</tr>
<tr>
<td>5-9 Units</td>
</tr>
<tr>
<td>10 or More Units</td>
</tr>
<tr>
<td>Mobile Home</td>
</tr>
<tr>
<td>Renter Occupied</td>
</tr>
<tr>
<td>Single Family Detached</td>
</tr>
<tr>
<td>Single Family Attached</td>
</tr>
<tr>
<td>Duplex</td>
</tr>
<tr>
<td>3/4 Plex</td>
</tr>
<tr>
<td>5-9 Units</td>
</tr>
<tr>
<td>10 or More Units</td>
</tr>
<tr>
<td>Mobile Home</td>
</tr>
<tr>
<td>100%</td>
</tr>
</tbody>
</table>

Source: U.S. Census Bureau
**HOUSING SUPPLY**

The 927 households represents only 84% of the 1,106 housing units identified in the 2010 federal census (exclusive of group quarters). The associated 15% vacancy figure is high in what is considered to be a tight housing market. The seemingly high vacancy rate and under utilization of existing buildings may be related to the condition of the buildings themselves. A survey and assessment of the local housing inventory was prepared as part of a housing analysis and plan prepared for the City in 2011. As shown in *Table 3*, the total housing supply at that time was 1,847 units, including group quarters. Only 60% of all units were classified as sound or needing only minor repairs, and the balance needing substantial or major repairs.

---

**TABLE 3: UNALASKA HOUSING SUPPLY & CONDITION**

<table>
<thead>
<tr>
<th>HOUSING UNITS (2011)</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Occupied</td>
<td>927</td>
</tr>
<tr>
<td>Vacant</td>
<td>179</td>
</tr>
<tr>
<td>Total</td>
<td>1,106</td>
</tr>
</tbody>
</table>

*Source: U.S. Census Bureau*

<table>
<thead>
<tr>
<th>HOUSING UNITS BY CONDITION (2011)</th>
<th>TOTAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sound</td>
<td>1,048</td>
</tr>
<tr>
<td>Minor Repair</td>
<td>70</td>
</tr>
<tr>
<td>Major Repair</td>
<td>421</td>
</tr>
<tr>
<td>Substantial Repair</td>
<td>144</td>
</tr>
<tr>
<td>Dilapidated</td>
<td>164</td>
</tr>
<tr>
<td>Total</td>
<td>1,847</td>
</tr>
</tbody>
</table>

*Source: Unalaska Comprehensive Plan 2020 Housing Plan*
Figure 2 summarizes the trend in new housing construction over the period 1996 through 2013. 145 new units were permitted over that period with 89 single family units and 50 units in buildings with five or more units. Much of this activity occurred before 2007.

The City has acted to rezone land for higher density residential development in the past two years, including sites on Strawberry Hill and in the Valley.
HOUSING GAP
The 2011 housing study identified a gap between current need and supply of 340 units, 245 of which would be rental and 95 owned.

PRICES, RENTS & VACANCY
The median home value in Unalaska reported to the U.S. Census Bureau in the American Community Survey for 2008 to 2012 was $309,500. This figure is consistent with state-wide sales prices reported by the Alaska Housing Finance Commission of $352,400 for new single family homes and $295,506 for existing homes. The average price for new and existing condominiums was $287,608 and $200,126. Average prices outside the major boroughs in the state were lower. There are few actual sales in the cities.

The average rent reported in the 2008 to 2012 American Community Survey was $1,330 per month. Table 4 below is consistent with the rents reported in a survey conducted as part of the local housing study.

<table>
<thead>
<tr>
<th>TABLE 4: MEDIAN HOUSING MONTHLY RENTAL RATES</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>APARTMENT</strong></td>
</tr>
<tr>
<td>Studio</td>
</tr>
<tr>
<td>1-Bedroom</td>
</tr>
<tr>
<td>2-Bedroom</td>
</tr>
<tr>
<td>3-Bedroom</td>
</tr>
<tr>
<td>4-Bedroom</td>
</tr>
<tr>
<td>5-Bedroom</td>
</tr>
</tbody>
</table>

* one person room ** two person room

Note: Figures from this housing survey may or may not include the price of utilities, which can be substantial - particularly heat - and are often subject to increasing rates, or pet deposits that can range from $500 to $1,000.

Source: MacSwain and Associates, Residential and Commercial/Industrial Rent Survey
DEVELOPMENT COSTS
Development costs for housing in rural Alaska is high as a result of transportation costs, climate considerations and shortage of local builders. The cost of construction is indicated by statistics from the Alaska Housing Finance Commission for its Teacher Health Professional and Public Safety Rental Program. The program provides grants to school districts, cities, housing authorities, and village councils for construction of housing. Table 5 summarizes the experience of the program over the past ten years. As shown, there were 90 projects, 72 of which were new construction and 18 of which were rehabilitation. The average cost of new construction was $357,000 per unit while the average cost of rehabilitation was $169,000. The figures indicate that housing is expensive, but the cost of rehabilitation can be significantly lower if suitable homes are available.

<table>
<thead>
<tr>
<th>MINOR REHAB</th>
<th>REHABILITATION</th>
<th>NEW CONSTRUCTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of Projects</td>
<td>1</td>
<td>17</td>
</tr>
<tr>
<td>Avg. Units per Project</td>
<td>7.0</td>
<td>4.3</td>
</tr>
<tr>
<td>Avg. Sq. Ft. per Unit</td>
<td>868</td>
<td>1,101</td>
</tr>
<tr>
<td>Avg. Cost per Unit</td>
<td>$73,734</td>
<td>$169,398</td>
</tr>
<tr>
<td>Avg. Cost per Sq. Ft.</td>
<td>$230</td>
<td>$338</td>
</tr>
</tbody>
</table>

Source: Alaska Housing Finance Commission, Property Counselors

AFFORDABILITY
One measure of housing affordability is the affordability index, the ratio an affordable price based on income and actual market values. The median household income in Unalaska according to the 2010 U.S. Census was $86,625. This high income can support a high purchase price. The affordable index is estimated to be 136.7 for ownership housing as shown in Table 6.

<table>
<thead>
<tr>
<th>AFFORDABILITY INDEX FOR OWNERSHIP</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Affordable Home Price</strong></td>
</tr>
<tr>
<td>Estimated Annual Income</td>
</tr>
<tr>
<td>30 Fixed Mortgage Rate</td>
</tr>
<tr>
<td>Affordable Monthly Principal &amp; Interest (@ 25%)</td>
</tr>
<tr>
<td>Affordable Mortgage</td>
</tr>
<tr>
<td>Affordable Home Price (80% Mortgage)</td>
</tr>
<tr>
<td><strong>Median Sale Price</strong></td>
</tr>
<tr>
<td><strong>Affordability Index</strong></td>
</tr>
</tbody>
</table>

*Index greater than 100 indicates that household with median income can afford median price home.

Source: U.S. Census Bureau
A similar index can be derived for rental housing as a ratio of affordable rents at specified income levels to actual rents. As shown in Table 7, a household with 80% of median income could not afford the median rent for a two bedroom home. Affordability is a more pressing issue for rental housing. Given the preponderance of rental housing, affordability is an obvious challenge.

<table>
<thead>
<tr>
<th>TABLE 7: HOUSING AFFORDABILITY INDEX FOR RENTAL HOUSING</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Affordable Rent</strong></td>
</tr>
<tr>
<td>Estimated Annual Income</td>
</tr>
<tr>
<td>80% of Median Income</td>
</tr>
<tr>
<td>Affordable Housing Expenditure (@ 30%)</td>
</tr>
<tr>
<td>Utilities Expense</td>
</tr>
<tr>
<td>Affordable Rent</td>
</tr>
<tr>
<td><strong>Median Rent 2 Bedroom</strong></td>
</tr>
<tr>
<td><strong>Affordability Index</strong>*</td>
</tr>
</tbody>
</table>

*Index greater than 100 indicates that household with 80% of median income can afford median rent.

Source: Property Counselors
HOUSING: ISSUES AND RESPONSES

The housing supply and market conditions can be summarized as several key issues. Several responses are identified for addressing each of those issues.

1. COST OF HOUSING DELIVERY
The primary reason for unmet housing needs in the community is the cost of housing delivery. Several responses could address this issue:

   **Renovate vacant units.**
   There are many vacant housing structures in poor condition in the community, and renovation can be a cost-effective alternative to new construction. Owners of such structures should be encouraged to invest in upgrading them.

   **Provide for a range of housing sizes and types.**
   Smaller sizes are generally cheaper to build than large ones. Multifamily structures can enjoy construction efficiencies over single family construction. By encouraging and facilitating a range, the community can provide lower cost options.

   **Coordinate housing delivery to achieve economies of scale.**
   Larger projects (in terms of numbers of units) can achieve efficiencies in material delivery and construction time and expense. Such projects can support both temporary construction crews and an experienced local workforce.

   **Take advantage of innovative construction methods and materials.**
   Use of factory-built components can speed construction time and reduce costs. Such components can include entire homes, building systems or precut components or panels. Further, creative use of shipping containers can provide transient or longer-stay housing.

2. HOUSING AFFORDABILITY
Housing cost is directly related to affordability. But affordability can be addressed in ways beyond cost reduction.

   **Provide more rental housing.**
   Rental housing is generally more affordable than owned housing. For a community with a significant transient population, this type is particularly important.

   **Provide additional forms of housing.**
   While this was mentioned above, there are forms of housing that are less traditional, but prove to be affordable. Examples include:

   - Accessory dwelling units to single family homes.
   - Co-housing with private sleeping units but shared social spaces.
   - Cottage housing with higher densities and shared grounds.

   These options are similar in some respects to the group quarters provided by some of the major employers, but can be adapted to the wider market.
3. LAND SUPPLY
Availability of sites with appropriate zoning and services is a necessary requirement of housing of all types.

Zone land for appropriate densities, types of housing, and size of project.
As noted above, reducing the cost and affordability of housing can be achieved through higher densities, varied housing types, and large projects with economics of scale. The City can work with willing property owners to be sure that suitable zoning is available to meet these objectives.

Encourage Infill Development.
Infill development can be a cost-effective way to address housing needs, because these areas are already served with roads and utilities. In some cases, infill lots are small and irregularly shaped. Appropriate development conditions can provide for a reasonable use of such lots.

Facilitate renovation of existing vacant units.
Some existing vacant units may require some flexibility in addressing deficiencies. Such flexibility relate to lowered thresholds for requiring certain upgrades or meeting current codes.

Support public awareness campaign for long-term land leases of housing sites.
It is the policy of the Ounalashka Corporation to lease land for development rather than sell it. This is an accepted practice in many areas, but still deters some potential developers or purchasers of housing in Unalaska. All parties interested in addressing the housing need should assist in increasing the acceptance of such an approach.

4. SPECIAL HOUSING NEEDS
There are a variety of special housing needs that are somewhat unique to communities like Unalaska. Many of these needs are related to the transient nature of much of the local workforce. In addition, as the community grows special needs housing for disadvantaged residents such as disabled persons, the elderly, persons with severe health problems and abused persons will need assistance.

Provide more transient housing.
Such housing includes bunkhouses for employees of local employers, but also available to others who require moderate-term stays.

Provide emergency shelter.
There is a particular need for emergency shelter for very short term stays.

5. INFORMATION CLEARINGHOUSE
All of the approaches described above would benefit from some organization serving as the clearinghouse for information on housing availability, housing assistance programs, and innovative methods for housing supply.
HOUSING GOALS AND STRATEGIES
The Comprehensive Plan should address these issues and responses through identification of goals and policies. The Housing Plan adopted February 22, 2011 provided a list of twelve goals and associated strategies for addressing housing conditions and needs. These goals provide an appropriate starting point for updating this element of the Comprehensive Plan. The goals generally address the issues identified in the last section. The relationship of the issues and goals is summarized below.

1. **Create a plan for the phased development of housing sites throughout the City of Unalaska.**
   The strategies for this goal provide a detailed action plan for meeting the housing need. The schedule was aggressive and many of the targets have been missed. But this goal also explicitly addresses Issue 3 above.

2. **Increase affordable home-ownership opportunities for current and future City residents.**
   This goal focuses on owned housing which is an important element of the housing need, but may not be as important as rental housing in addressing overall affordability.

3. **Increase the supply of affordable rental housing using local funds to leverage other resources.**
   This goal addresses Issue 2 above.

4. **Preserve and improve the condition and stability of existing housing throughout the City.**
   This goal is related to the rehabilitation of vacant housing in Issue 1, but also addresses existing occupied housing.

5. **Make existing housing more affordable.**
   This goal is related to Issue 2.

6. **Adaptively reuse older landmark historic buildings to preserve Unalaska’s historic heritage and create a broader range of housing choices.**
   This goal is related to the rehabilitation of vacant buildings in Issue 1.

7. **Provide a comprehensive system of emergency shelter.**
   This goal addresses Issue 4.

8. **Improve homebuyer confidence in the concept of leasing land for housing; and structure land lease terms to address the needs of both OC and potential lessees.**
   This goal addresses a part of Issue 3.

9. **Ensure that zoning and all regulatory and permit processes support the redevelopment of in-fill lots and new subdivisions for new housing development.**
   This goal addresses a part of Issue 3.

10. **Create greater awareness and compliance of fair housing laws and requirements among local landlords.**
    This goal relates to Issue 5.

11. **Increase the capacity of all local organizations to carryout housing improvement and development.**
    This goal addresses a broader strategy of providing capacity in the community to address housing issues.
12. Create a climate that fosters efficient, collaborative and sustainable progress in carrying out improvements in housing affordability, supply and conditions.
This goal addresses a broader strategy of providing capacity in the community to address housing issues.

Table 8 below provides a reference to the relationship between the issues and responses above with the goals and strategies outlined in the Housing Plan.

<table>
<thead>
<tr>
<th>ISSUE</th>
<th>GOALS &amp; STRATEGIES</th>
</tr>
</thead>
</table>
| 1. COST OF HOUSING DELIVERY | (4) Preserve and improve the condition and stability of existing housing throughout the City.  
(6) Adaptingly reuse older landmark historic buildings to preserve Unalaska’s historic heritage and create a broader range of housing choices. |
| 2. HOUSING AFFORDABILITY | (2) Increase affordable home-ownership opportunities for current and future City residents.  
(3) Increase the supply of affordable rental housing using local funds to leverage other resources.  
(5) Make existing housing more affordable. |
| 3. LAND SUPPLY | (1) Create a plan for the phased development of housing sites throughout the City of Unalaska.  
(8) Improve homebuyer confidence in the concept of leasing land for housing; and structure land lease terms to address the needs of both OC and potential lessees.  
(9) Ensure that zoning and all regulatory and permit processes support the redevelopment of in-fill lots and new subdivisions for new housing development. |
| 4. SPECIAL HOUSING NEEDS | (7) Provide a comprehensive system of emergency shelter. |
| 5. INFORMATION CLEARINGHOUSE | (10) Create greater awareness and compliance of fair housing laws and requirements among local landlords. |
| BROAD STRATEGY: BUILDING CAPACITY IN COMMUNITY | (11) Increase the capacity of all local organizations to carry out housing improvement and development.  
(12) Create a climate that fosters efficient, collaborative and sustainable progress in carrying out improvements in housing affordability, supply and conditions. |
This section of the report provides the CPAT’s observations and recommendations for City updates to the adopted “Comprehensive Plan 2020.” The team’s charge was to help the City define steps necessary to prepare a land use plan that would direct goals and policies for future growth and development of the community. A previous section describes the Team’s process for addressing future land uses and locations with avid participation by residents, owners, organizations, officials, staff, and kids. Before we describe this outcome, we offer some thoughts about the form and content of the current plan.

THE COMPREHENSIVE PLAN

Comprehensive plans are important in many ways:

- They express the community’s vision and expectations for the future;
- They provide background information that describes the geographic and physical setting, the demographics of the people, the community history and its “soul”;
- They articulate the range of problems, opportunities, threats and weaknesses of the community in present circumstances;
- They state goals, policies and strategies for accommodating future growth; and
- They include factors or criteria for measuring progress as implementation is achieved.

Therefore, comprehensive plans are tools to be used by the local government to make decisions about capital investment and regulations, and are important to show outside funders and regulators that the community “has its act together”. The Unalaska Plan contains most of these elements and has clearly been useful in guiding recent major infrastructure and community building actions.

To the first time reader, the organization of the Plan is confusing. For example, the community vision is expressed succinctly as “Unalaska would be an unforgettable, delightful, charming, and enchanting place to live and a fun, irresistible destination to visit . . . Unalaska would be truly unique—once you live here, or come to visit, you won’t want to leave.” This aspirational statement is then described at length first in terms of:

- The natural environment;
- The built environment;
- Infrastructure;
- Airport;
- Economic strength;
- Housing;
- Education;
- Art, entertainment & recreation;
- Visitor attraction;
- Government; and
- Cooperation and involvement.

Then, these recommendations are further discussed in the context of the 2009 Community Survey and organized here as “Primary Community Priorities” distilled down into the “Top Ten Priorities”: 

- Economic development;
- Health & well-being;
- Overall quality of life;
- Physical appeal;
- Environment/ambience; and
- Education, art, culture & entertainment.
These priorities are broken down by “primary community priorities” and “secondary community priorities”. Then, the “Community Action Agenda” presents goals, values, and actions.

The next section of the Plan provides strategies for implementation under the priority topics. This is heavily weighted towards infrastructure actions related to the port development plan, utilities, and municipal facilities due to the aggressive recent completion of master plans for domestic water, sanitary sewer, solid waste, and the library. Strategies for other priorities are less well detailed since further analyses and master plans have not been done.

Housing is addressed in a separate plan with comparable goals and community visions, but is much more highly analytical in terms of the demography, economic conditions, and regulatory environment. This CPAT report contains an extensive review of current housing issues and recommendations for integrating this important element into the Land Use Plan.

The final section of the Plan “Implementation Actions” does not provide a checklist for the actions included in the earlier sections. To sum up, the current adopted Unalaska Comprehensive Plan is a very thorough one, but is difficult for citizens and officials to parse due to the density of information, the duplications, and varying formats that express the priorities and how they are to be met. It is difficult to understand how implementation “actions” are scheduled or whether they are completed, or if they have not been completed as scheduled – whether circumstances have changed or there are roadblocks to completion.

As the land use section of the plan is developed, we recommend that the current priorities and actions be revisited and organized in such a way as to clarify how the City will institute procedures for meeting the community’s vision and priorities.

A good way to present complex community plans that cover long-term future visions and articulate implementation strategies that public and private decision-makers can use is to:

- Establish a concise vision for the future in terms of population and economic growth, and the aspirations for maintaining and enhancing the quality of life.
- List strong, achievable goals for the “community priorities” based on public outreach and communication
- Detail each goal with clear, definitive policies that describe actions to be taken through regulatory measures, public investment, and metrics for measuring success as implementation occurs
- Prepare action plans in short-term, mid-range, and long-term sequences that build towards achieving the goals and are consistent with the policies.
- Adopt procedures for revisiting the vision, goals, policies, and strategies on a regular basis in order to keep track as implementation occurs, the City grows, economic conditions change, and new issues emerge.
- Link the Land Use Plan with the functional plans for transportation, utilities, the development code, and with state or regional plans and programs.

THE LAND USE PLAN
The current Comprehensive Plan Land Use section mostly describes existing conditions in the form of zoning maps, zoning descriptions, and some discussion of issues and conflicts. The City has compiled much more information about current land use, ownership patterns, and is working on updating the land use regula-
tions. The CPAT focused on where, and to what extent, future growth and development should be directed via land use designations, zoning, and infrastructure improvements. Community participants in our meetings, interviews, and discussions provided their perceptions regarding how things should be addressed in further planning. Major topics included:

1. If Unalaska becomes a “home port” for oil and gas exploration activities in the Bering Sea, where should this function be located and how should it be permitted for land-based, shoreline and residential development?

2. How should the current and projected fishing industry be protected through further port expansion for vessels, processing, storage and shipping?

3. How should new community facilities such as the proposed hospital be developed to harmonize with other community services?

4. Where should new residential development be concentrated in order to benefit from established infrastructure, access, and favorable siting?

5. What kind of provisions should be made for expanded or new commercial business, tourism, and community services that are central to the population? And,

6. What kind of policies need to be adopted to address development under these scenarios.

Unalaska’s Planning Commission and City Council are responsible for directing growth and change through land permitting approvals, investment in public infrastructure, within the context of the community’s unique character defined by the fishing industry (whether Unalaska becomes a home port or a staging port for their activities), pending oil and gas industry, land ownership patterns, and a shifting population.

Previous sections of this report describe our findings and conclusions associated with oil and gas and fishing port development questions #1 and #2.

*Map 11* highlighted earlier in this report, shows our conclusions regarding the potential location preferences that came out.

*Table 9* is a summary of what the CPAT heard from community members during their visit and researched regarding future development potential for locations within the greater Unalaska area. Note that residential uses are further described in the Housing Needs Section (Map 10) and the Potential Impacts of the Oil and Gas Industry – Marine Terminals and Service Section (Map 7).

*Map 11*: These themes emerged through the community engagement process during the CPAT’s visit. *Created by CPAT member Tom Kurkowski*
## TABLE 9: SUMMARY OF PUBLIC COMMENT & CPAT RESEARCH REGARDING POSSIBLE LAND USES BY AREA

<table>
<thead>
<tr>
<th>LOCATION</th>
<th>HOUSING</th>
<th>COMMERCIAL</th>
<th>COMMUNITY FACILITIES</th>
<th>INDUSTRY</th>
<th>CONSERVATION/ PRESERVATION/ OPEN SPACE</th>
<th>NOTES:</th>
</tr>
</thead>
<tbody>
<tr>
<td>DOWNTOWN</td>
<td>• Single Family • Townhouses • Apartments</td>
<td>• Restaurant &amp; Retail • Small Business</td>
<td>• Recreation</td>
<td>• Outdoor Recreation • Historic Area</td>
<td></td>
<td></td>
</tr>
<tr>
<td>VALLEY</td>
<td>• Single Family • Townhouses</td>
<td>• Restaurant &amp; Retail</td>
<td>• Hospital</td>
<td>• Outdoor Recreation • Subsistence</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BUNKER HILL / SOUTH AMERICA</td>
<td>• Single Family • Townhouses</td>
<td></td>
<td>• Marine Industrial</td>
<td>• Outdoor Recreation</td>
<td></td>
<td></td>
</tr>
<tr>
<td>STRAWBERRY HILL</td>
<td>• Single Family • Townhouses</td>
<td></td>
<td>• Hospital</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>STANDARD OIL HILL</td>
<td>• Single Family • Townhouses • Apartments</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>MARGARET BAY</td>
<td></td>
<td>• Lodging • Restaurant &amp; Retail</td>
<td></td>
<td>• Historic Area</td>
<td></td>
<td></td>
</tr>
<tr>
<td>AIRPORT &amp; BALLYHOO</td>
<td>• Single Family • Townhouses</td>
<td></td>
<td>• Hospital</td>
<td>• Subsistence • Historic Area</td>
<td></td>
<td></td>
</tr>
<tr>
<td>CAPTAINS BAY</td>
<td>• Employee Housing</td>
<td></td>
<td>• Marine Industrial • Oil &amp; Gas • Sensitive Areas • Subsistence</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>DUTCH HARBOR (CITY PORT)</td>
<td></td>
<td></td>
<td>• Marine Industrial</td>
<td></td>
<td>Docks &amp; landside development for fishing fleet support. Expansion of facilities for passenger vessels, cargo handling, fueling. Private vessel moorage.</td>
<td></td>
</tr>
<tr>
<td>SUMMER BAY</td>
<td></td>
<td></td>
<td>• Oil &amp; Gas</td>
<td>• Outdoor Recreation • Subsistence</td>
<td></td>
<td>More information about this site is in the Oil and Gas section. The community showed interest in keeping this for outdoor recreational and subsistence uses. Availability of flat land and access is an issue here.</td>
</tr>
<tr>
<td>ILIULIU K BAY NATEEIKIN BAY BROAD BAY WIDE BAY</td>
<td></td>
<td></td>
<td>• Oil &amp; Gas</td>
<td>• Subsistence • Outdoor Recreation</td>
<td></td>
<td>More information about this site is in the Oil and Gas section. The community showed interest in keeping this for outdoor recreational and subsistence uses. Land use for some of these areas will be hard to define as practical access is limited to marine or air access.</td>
</tr>
</tbody>
</table>

Note: This table is intended for use as a starting point in future land use planning efforts.
MEET THE TEAM

Roger Wagoner, FAICP  |  Team Leader
Roger Wagoner is currently director of community design with BHC Consultants LLC. Wagoner is a certified planner with 35 years of experience in planning, environmental analysis, and community development with work provided throughout the Pacific Northwest and Alaska. He is recognized for his expertise in land use planning and growth management plans, environmental and housing analyses, urban design plans, capital development programs and community facilitation. He excels in team building and project team management and has developed planners’ training curriculum for state agencies.

Greg Easton
Greg Easton has almost 40 years’ experience in providing economic consulting services related to economic and community development in the Pacific Northwest region and elsewhere. As a founding principal of Property Counselors and other regional and national consulting firms, he has worked with public and private clients to identify economic opportunities and impacts. He has specialized experience working with waterfront communities to address issues such as marine commerce, tourism development, and public access. He has worked with cities and port districts to identify realistic levels demands for various water-dependent and water-related uses for key sites.

Thomas Kurkowski
Tom Kurkowski has been involved in the geospatial field for over a decade. In his current role as Operations Lead at the Scenarios Network for Alaska and Arctic Planning (SNAP), Kurkowski leads a highly technical staff in modeling and producing value added products, tools, visualizations, and statistical analyses from historical and projected climate variables. While working for the Alaska Department of Natural Resources, his contributions included development of a wildland fire risk model, methodological development of three-dimensional forest typing, mobile GIS application, and the immediate support of wildland fire suppression activities.
Shelly Wade, AICP

Shelly Wade began her career in Southwest Alaska as an AmeriCorps VISTA volunteer with the Alaska Department of Community and Economic Development in 2001. She has worked with a wide range of clients, most recently assisting with updating the Southwest Alaska Comprehensive Economic Development Strategy. Prior to joining Agnew::Beck, as a consultant at Information Insights, Wade worked with the Aleutian Pribilof Islands Association to develop community strategic plans for Nikolski and St. George. She also worked with the Pauloff Harbor and Unga tribes to develop plans for meeting existing and future needs of tribal members.

Majid Yavary

Majid Yavary has more than 18 years of experience in international project/program management, port management, port planning, and marine engineering. He has participated in projects in nearly 50 countries and is qualified in planning, design, and construction of marine structures; design and implementation of large scale capital dredging and reclamation projects; planning, development, and design of container terminals; and marine elements of oil, LNG, LPG, and other liquid bulk import and export terminals. He has served as the principal U.S. representative on the Permanent International Association of Navigation Congress (PIANC) MarCom Working Groups.

Ryan Scherzinger | APA Staff

Ryan Scherzinger is Senior Outreach Associate for the American Planning Association. He's worked extensively on APA's Community Planning Assistance Teams (CPAT) program providing direct technical assistance to communities around the country with multi-disciplinary teams of experts. He's managed myriad programs and special projects for APA for over 7 years, including community workshops, case studies, federal grants, symposia and lecture series, study tours, international events, allied outreach and coalitions, and interactive public exhibits.
PICTURE GALLERY
The following are select photographs from the CPAT visit to Unalaska, AK.

The view atop Mount Ballyhoo (1,634 feet) offers spectacular views of Unalaska, Iliuliuk Bay, and the Port of Dutch Harbor when clouds don’t block visibility. Photos by Ryan Scherzinger
The Carl E. Moses boat harbor facility is a new feature in Unalaska, dedicated in December 2011. The facility offers 52 boat slips and 345 LF; long term slips and transient moorage for vessels up to 150 feet; and potable water, shore power, waste oil disposal, and refuse removal.

City Manager Chris Hladick and team leader Roger Wagoner, FAICP touring the harbor (below).  Photos by Ryan Scherzinger
Team leader Roger Wagoner, FAICP with Pipa Escalante of Channel 8 Production and Operations. Pipa filmed an interview with Wagoner and APA staff member Ryan Scherzinger for the community television series, FLASH. Team member Shelly Wade, AICP hosted the live program that included the pre-recorded interview later in the week. *Photo by Ryan Scherzinger*

The Unalaska CPAT (*from left*: Tom Kurkowski; Greg Easton; Roger Wagoner, FAICP; Majid Yavary; Shelly Wade, AICP; and Ryan Scherzinger) standing in front of the Russian Orthodox Church of the Holy Ascension, which was originally built in 1825 - one of the oldest churches in Alaska. *Photos by Ryan Scherzinger and Erin Reinders, AICP*
A view of Unalaska from above. The Iliuliuk River runs through the heart of town. Housing extends out into “The Valley” in the distance. Photo by Ryan Scherzinger

A view of Summer Bay in an area outside of the City of Unalaska that belongs to the Ounalashka Corporation. Photo by Ryan Scherzinger
## APPENDIX A: CPAT Schedule

### Unalaska CPAT Schedule

**May 19-23, 2014**

<table>
<thead>
<tr>
<th>TIME</th>
<th>MONDAY, MAY 19</th>
<th>TUESDAY, MAY 20</th>
<th>WEDNESDAY, MAY 21</th>
<th>THURSDAY, MAY 22</th>
<th>FRIDAY, MAY 23</th>
</tr>
</thead>
<tbody>
<tr>
<td>8:00 AM</td>
<td>Team Meeting (Library)</td>
<td>Team Meeting (Burma)</td>
<td></td>
<td>Team Meeting</td>
<td>Team Meeting</td>
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<tr>
<td></td>
<td></td>
<td></td>
<td>Working Session</td>
<td>(Library)</td>
<td>(Library)</td>
</tr>
<tr>
<td>9:00 AM</td>
<td>Radio Interview AM Unalaska (Burma)</td>
<td>Stakeholder Meeting 1: Development Review Team (Burma)</td>
<td></td>
<td>Working Session</td>
<td>Working Session</td>
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<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>(Library)</td>
<td>(Library)</td>
</tr>
<tr>
<td>10:00 AM</td>
<td>Set up work space / Preview public meeting spaces / Discussion</td>
<td>Stakeholder Meeting 2: OC Staff and Board members (Burma)</td>
<td>Port Focus Tour with Port Director</td>
<td>Working Session</td>
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<tr>
<td>11:00 AM</td>
<td>Pretape for FLASH Unalaska (Burma)</td>
<td>Stakeholder Meeting 3: Community Groups and Faith-based Organizations (Burma)</td>
<td>Museum of the Aleutans Visit with Director</td>
<td></td>
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</tr>
<tr>
<td>12:00 PM</td>
<td>Lunch Meeting with City Staff Directors</td>
<td>Lunch</td>
<td>Lunch with City Resource Manager (Senior Center)</td>
<td>Lunch with PC Chair, Mayor, City Manager, Planning Director</td>
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<tr>
<td>1:00 PM</td>
<td></td>
<td>Stakeholder Meeting 4: Fish Processors (Burma)</td>
<td>Youth Outreach - U.S. Government Class (School)</td>
<td></td>
<td></td>
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<tr>
<td>2:00 PM</td>
<td></td>
<td>Stakeholder Meeting 5: Cargo-related (Burma)</td>
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<td></td>
<td></td>
</tr>
<tr>
<td>3:00 PM</td>
<td></td>
<td>Stakeholder Meeting 6: Fuel &amp; Logistics (Burma)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4:00 PM</td>
<td>Community Tour</td>
<td>Stakeholder Meeting 7: Pilots &amp; Tug (Burma)</td>
<td>Stakeholder Meeting 8: Local Businesses (PCR)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>5:00 PM</td>
<td></td>
<td>Dinner</td>
<td>Dinner</td>
<td>Dinner/ Public Meeting Preparations</td>
<td></td>
</tr>
<tr>
<td>6:00 PM</td>
<td></td>
<td>Meeting Prep</td>
<td>Community Outreach (PCR)</td>
<td>Community Outreach (Grocery store)</td>
<td></td>
</tr>
<tr>
<td>7:00 PM</td>
<td></td>
<td>Working Session</td>
<td></td>
<td>Public Meeting/ Open House (PCR)</td>
<td></td>
</tr>
<tr>
<td>8:00 PM</td>
<td>Public Meeting/ Open House (Burma)</td>
<td></td>
<td></td>
<td>Host FLASH Unalaska with Planning Commission Chair</td>
<td></td>
</tr>
</tbody>
</table>
The Community Planning Assistance Teams program is made possible through the American Planning Association and its professional institute, the American Institute of Certified Planners.

The City of Unalaska applied for assistance through the CPAT program. City staff served as the primary liaisons to APA staff and the volunteer team members during the pro bono project. APA wishes to thank the Unalaska community for their support, participation, and invaluable knowledge throughout the project.