

Comparing lay vs. expert place-based knowledge and participation supporting marine spatial planning

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Plan4Blue conference

Helsinki 4.6.2019



Marine spatial planning and need for stakeholder participation

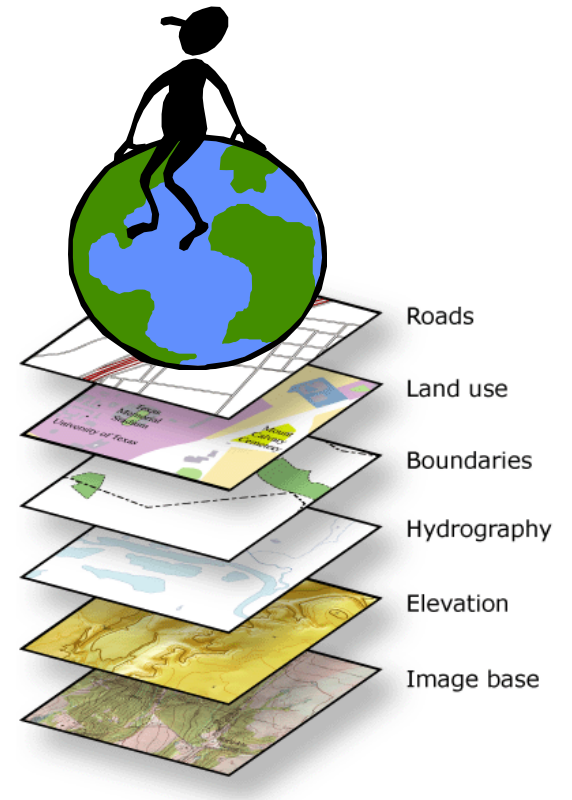
- Integrated coastal and marine spatial planning processes are sensitive to lack of participation, since **coastal and marine space is usually an arena of multiple stakeholders values, interests and activities.**
- **Lack of participation hampers identification of culturally, socially, environmentally and economically important areas.** Lack of knowledge hampers evidence-based spatial planning processes.
- Participation opens a possibility for **integrating knowledge of coastal and marine areas from local residents and other key stakeholders** into the planning process.

MARITIME SPATIAL PLANNING

Maritime spatial planning involves coordinating the needs of different industries. Planning will focus particularly on the following sectors: energy, maritime transport, fisheries and aquaculture, tourism, recreational use, and conservation, protection and improvement of the environment and nature. There will also be an emphasis on national security needs, the characteristics of the marine area and interaction between the land and sea. Other themes, such as cultural heritage, the mining industry, blue biotechnology or maritime industry can also be addressed.

Stakeholders and place-based knowledge

- Include social knowledge into the process of collection, management and analysis of spatial information
 - Integrating local and expert knowledge
 - Multidimensional interpretations of space, place and reality through GIS
- **Involves local communities and other stakeholders in the creation of information to be fed in GIS and used in spatial decision making (Dunn 2007)**
- Develops and supports qualitative approaches to building knowledge and explanation with GIS – **aims to explain societal processes more in-depth** (Cope & Elwood 2009)



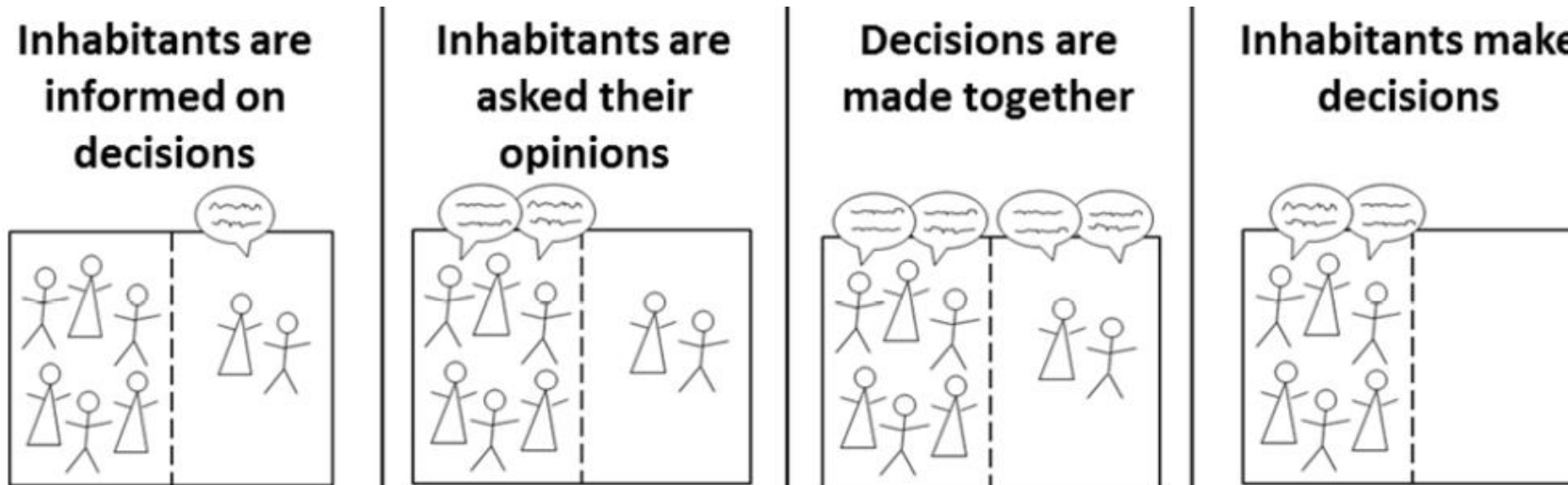
“The community itself needs to be regarded as a form of a database, unconventional in the IT sense, but wholly understandable from a social science perspective.”
(Carver 2001)

Participatory GIS (PGIS); Public Participation GIS (PPGIS); Community-integrated GIS, GIS-2; Collaborative GIS; GIS for participation; GIS in participatory research; Spatially sensitive participation; Feminist GIS; CriticalGIS

Different levels of participation: *participation ladder*

Stakeholder participation the current paradigm in land use and environmental planning

Enhancing communication and interaction between stakeholders (inhabitants, interest groups, planners and decision makers..)



Eilola, Fagerholm, Khamis, Käyhkö 2014, J. Env. Plann. Manag.

Participatory planning can/should also be a ***learning process*** integrating multiple voices

Sherry Arnstein (1969), Carver 2001, McCall 2007

International Association of Public Participation: <https://www.iap2.org/page/corevalues>

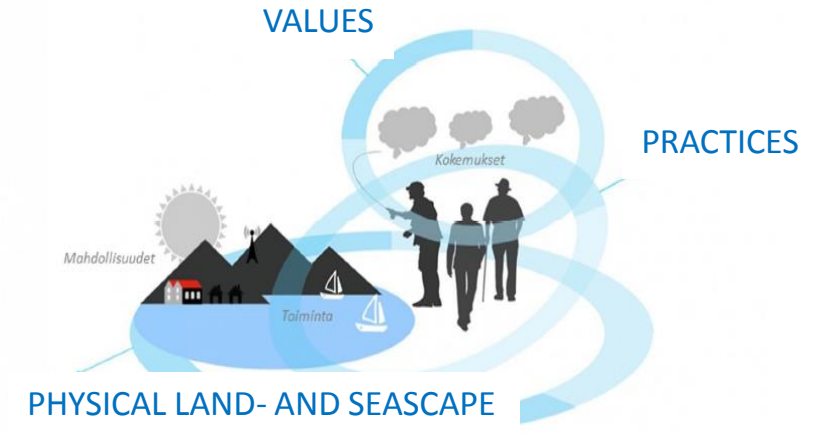
Realities of marine spatial planning in Europe

- The realities of marine spatial planning contrast with related conceptual ideals
 - often focused on achieving specific sectoral objectives, related to ***nationally important strategic blue growth priorities***, and might better be termed ‘strategic sectoral planning’
- Top-down approaches dominate from which participative platforms are disconnected by design from executive decision-making
- Politically expedient focus on integrated-use is undermining environmental priorities
 - concerns about the tensions between the Marine Strategy Framework Directive and the Directive Establishing a Framework for Maritime Spatial Planning
 - diverging from and ***potentially competing with ecosystem-based MSP’ing***, including marine protected area networks
- A more critical empirical approach to marine spatial planning research is needed

(Jones et al., 2016 – review of 12 case studies in Europe)

Marine and coastal spatial planning and the question of participation

- MCSP, ICZM, MSP – we are talking about strategic level planning
- Who are the stakeholders?
- Who should participate? Individuals, organisations?
- Who has interest to participate?
- What information could be valuable to collect through participation and what is the value in spatially explicit data (i.e. participatory GIS approach)?



Heterogeneity in collecting spatially explicit data through participation – PPGIS/PGIS an established method and practise

What?

Everyday activities, land use
 Values, meanings
 Development preferences
 Threats, condition of environment, crisis events
 Ecosystem services
 Environmental impacts
 Evaluation of drafted plans

Scales?

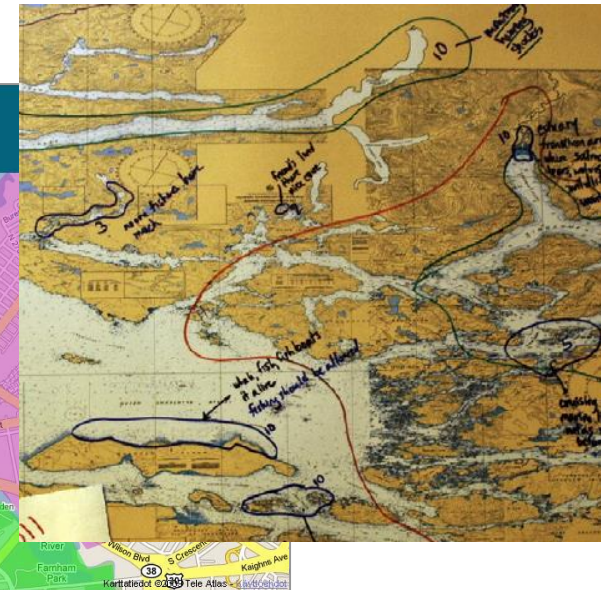
Block
 Neighbourhood
 City/village
 Regional level
 National level

Who?

Various actors:
 Adults, children, elderly people
 Organisations, communities
 Interest groups
 Experts
 Government officials

How?

Individual vs. group:
 Survey (paper vs. digital/mobile)
 Interview
 Workshop





SATAKUNTALIITTO



Turun yliopisto
University of Turku

Satakunnan rannikon luontomatkailu ja virkistyskäyttö

Tervetuloa!

Tämän kyselyn tarkoituksena on kerätä mielipiteitä luontomatkailun ja virkistyskäytön kannalta merkittävistä alueista Satakunnan rannikkoalueella. Tavanomaisten kysymysten ohella pääset merkitsemään kartalle paikkoja, joita pidät merkityksellisinä itsesi kannalta. Arvokkaiden kohteiden lisäksi kyselyllä kerätään tietoa ihmistoiminnan mahdollisista ympäristövaikutuksista alueella.

Kysely koskee Satakunnan merirannikkoaluetta rajautuen idässä valtatie 8:an. Toivomme sinun kertovan mielipiteesi siitä, mikä on alueella toimivaa, mitä arvoja pidät alueella tärkeimpinä sekä missä olisi mielestäsi kehittämisen tarvetta.

Kyselyyn vastaaminen kestää noin 15 min ja vastauksia käytetään Satakunnan alueen meri- ja rannikkoalueen suunnittelussa.

Kyselyn ovat laatineet Satakuntaliitto sekä Turun yliopisto.



EUROOPAN UNIONI
European Regional Development Fund

Rannikkoaluesuunitelman kommentointi subjektiivisiin kokemuksiin keskittyen

Mikä on Selkämerellä hienointa? Missä olet havainnut ongelmia? Minkälaisia ne ovat olleet? Mitä toimintoja on mielestäsi tarpeen lisätä?

Vastaa Satakunnan meri- ja rannikkoalueen virkistyskäyttöä ja matkailua koskevaan kyselyyn. Vastaaminen vie 5–10 minuuttia. Voit kertoa näkemyksesi täysin nimettömänä. Ainoastaan mielipiteesi Satakunnan rannikkoalueesta kiinnostavat.

Vastaamaan pääset osoitteessa:
<https://app.maptionnaire.com/fi/4076/>

Kyselyn toteuttavat Satakuntaliitto ja Turun yliopisto. Tuloksia tullaan hyödyntämään matkailu- ja virkistyskäytön kehittämisessä Satakunnan rannikkoalueella.

Lisätietoja: Satakuntaliitto, projektisuunnittelija Asko Ijäs
puh. +358 44 711 4393, asko.ijas@satakunta.fi



EUROOPAN UNIONI
Euroopan aluekehitysrahasto



**SustainBaltic ICZM Plans for Sustaining Coastal and Marine
Human-ecological Networks in the Baltic Region 2016-18**

Mitkä paikat ovat sinulle tärkeitä Kokemäenjokilaakson alueella?

Valitse alla oleva merkki ja vie se kartalle haluamaasi kohtaan. Karttaa ja pallukkaa voit liikuttaa hiirellä pitämällä hiiren vasemman näppäimen painettuna. Jos haluat lisätä useita paikkoja, tallenna merkintäsi ja klikkaa hiirellä uudelleen pallukan kohdalla.

Lähennä karttaa oikean reunan + -näppäimellä tai hiiren rullalla, jotta saat merkittyä paikan kartalle mahdollisimman tarkasti!

Tärkeät paikat

Merkitse sinulle tärkeät paikat. Voit merkitä useamman paikan.

<
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Tärkeät paikat

Minulle on tässä paikassa tärkeää

- Maastossa liikkuminen (retkeily, vaeltaminen ym.)
- Vesillä liikkuminen (veneily, melonta, suppailu ym.)
- Luonnon tarkkailu (esim. kasvien tai lintujen havainnointi)
- Luonnontuotteiden keräily (esim. marjat ja sienet)
- Kalastus/metsästäys
- Mahdollisuus rentoutua
- Mökkeily
- Kuntoilu/urheilu
- Uinti
- Kulttuurikohteessa/-tapahtumassa vierailu
- Taideharrastus
- Koulutus/tutkimus
- Ajanvietto perheen tai muiden ihmisten seurassa
- Kaunis maisema
- Tuoksut/äänet
- Paikan synnyttämät tunteet, ideat ja elämykset (esim. inspiroituminen, jännitys)
- Uskonnollinen/henkinen kokemus
- Tärkeät muistot
- Elinkeinoon harjoittaminen
- Puhdas luonto

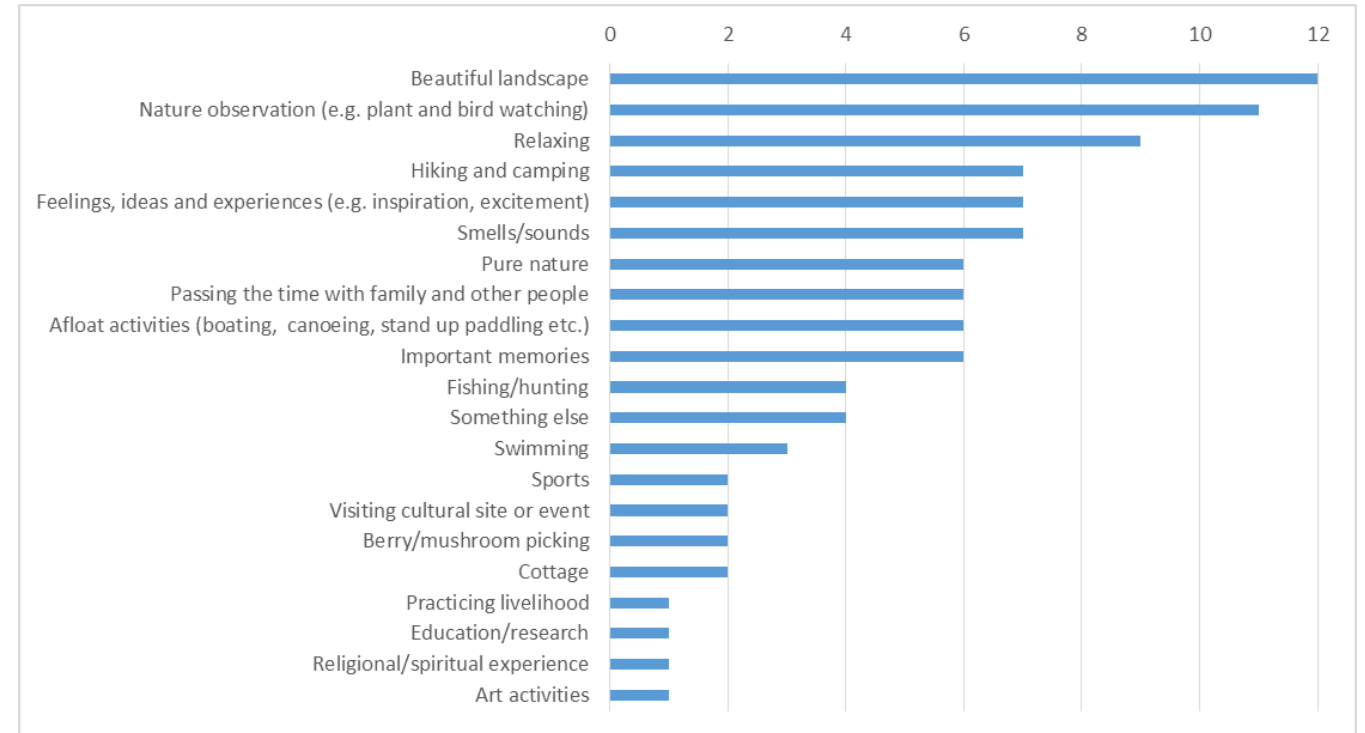
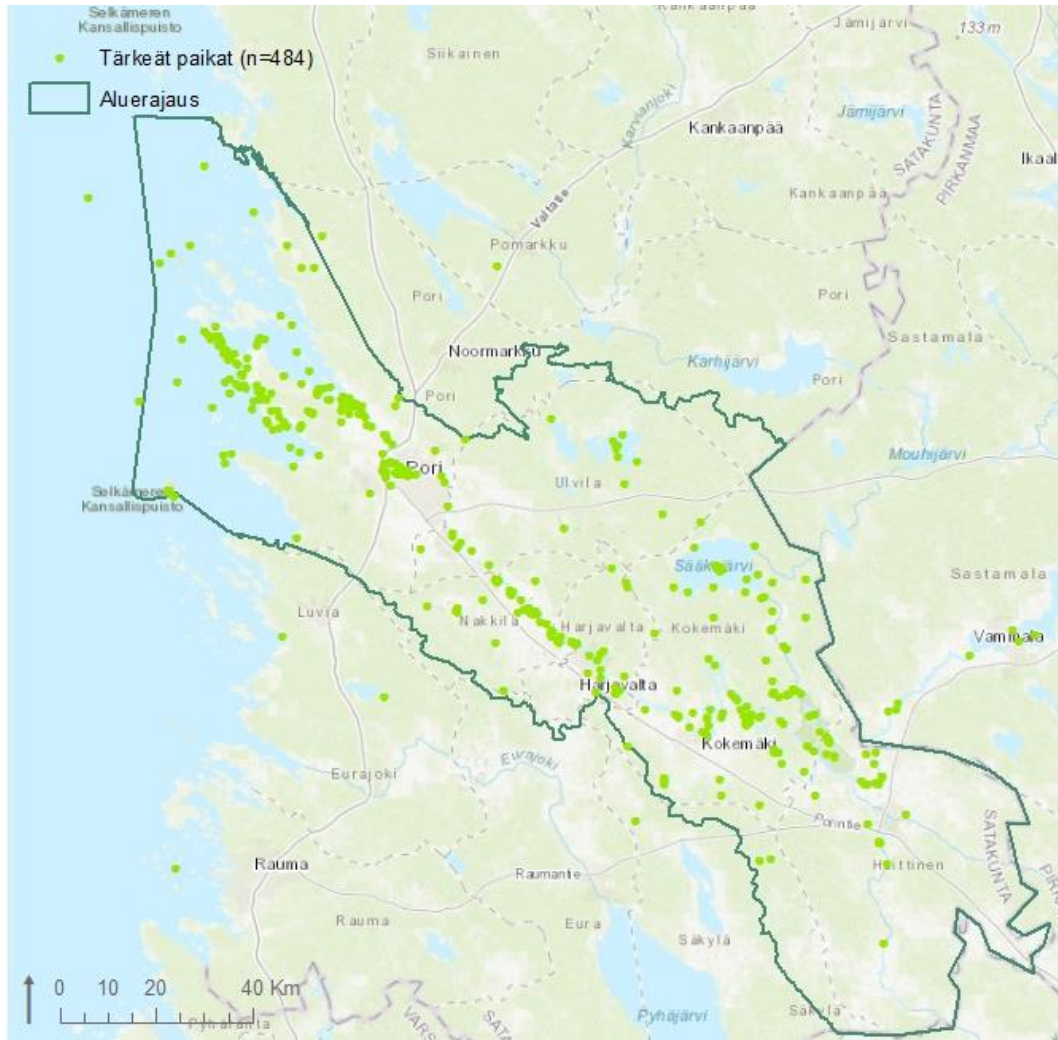
Jos jokin muu, kuvaile lyhyesti:

Mikä on tämän paikan nimi? Voit halutessasi kuvata tässä vielä omin samoin tätä paikkaa.

🗑️
Save



Results Kokemäenjoki river watershed: Favourite places

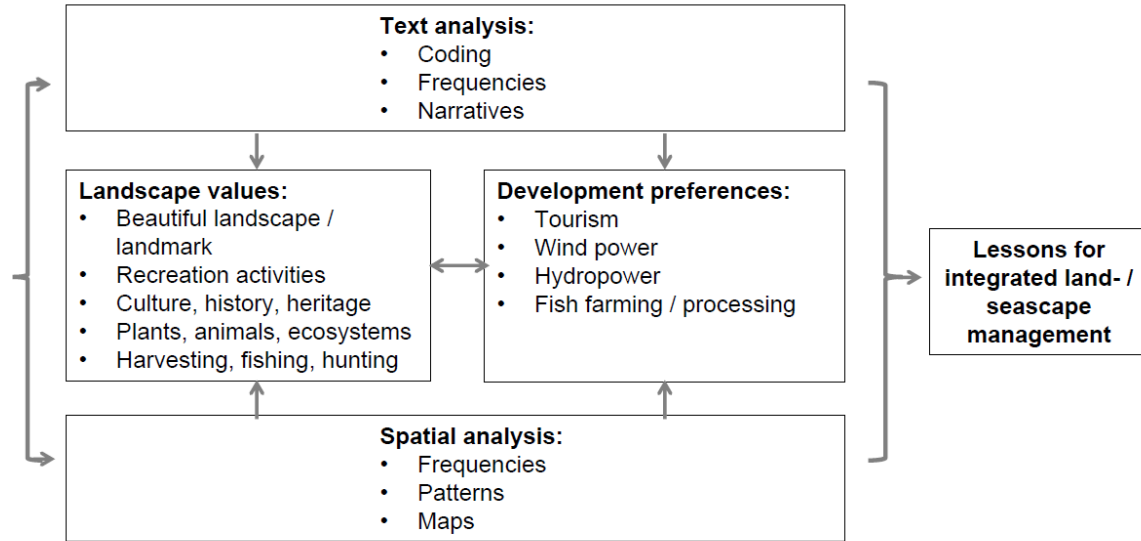
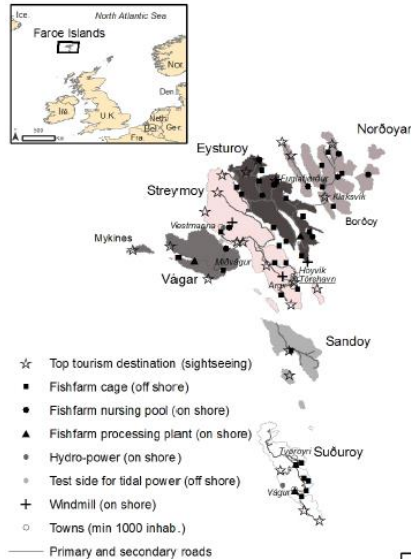


109 persons mapped 484 favorite places

2002 values or activities selected

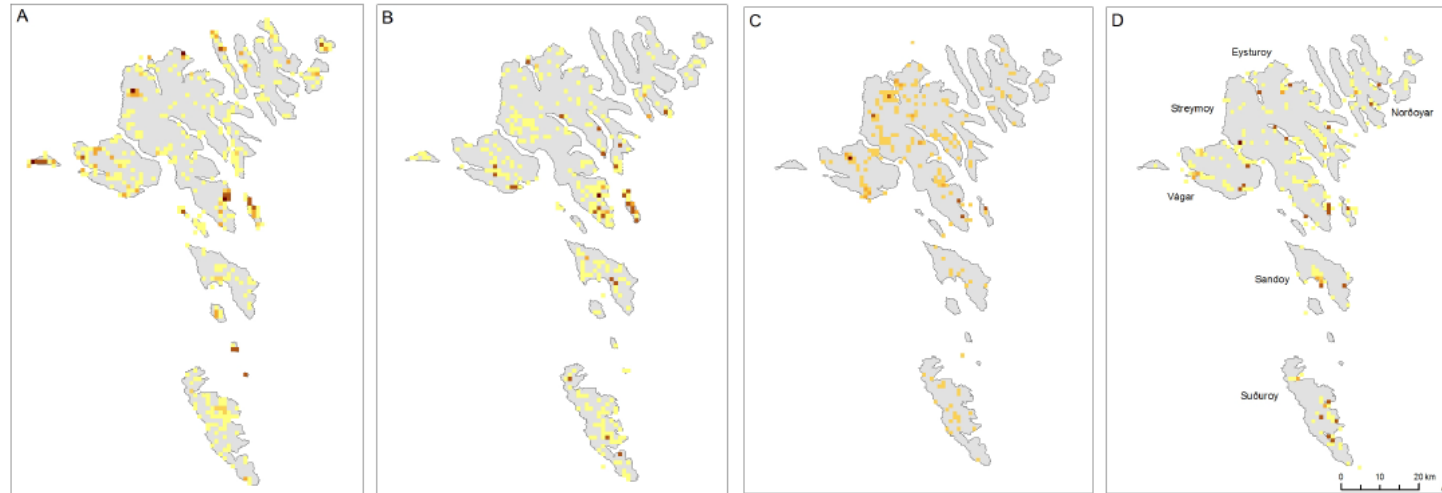
+ Place descriptions: In the open answers people valued nature, home/cottage, perceptions, services, activities, culture and livelihood

Landscape values and development preferences – identifying conflict potential at the Faroe Islands



Conflict potential:

- tourism
- wind power
- water power
- fish farming

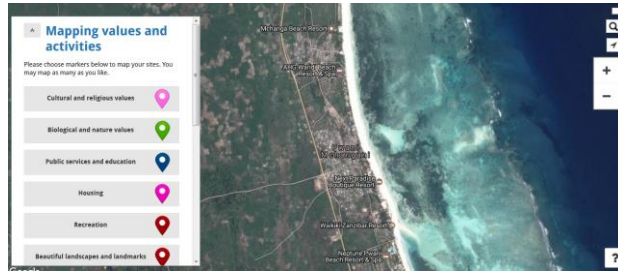


Role of place-based knowledge in supporting integrated coastal and marine spatial planning in Zanzibar, Tanzania

Käyhkö et al. 2019, Ocean and Coastal Management

Participatory mapping: two methodological set-ups

”Perception” ...”External”



- 27 government and NGO stakeholder used web-based tool to mark sites of importance (values, activities) on a satellite images
- Mapping based on their personal perception of importance of the sites
- Opportunities and threats related to these sites listed

Mapping coastal opportunities and threats using digital mapping platform (for the government officers and stakeholders)

”Experience” ...”Internal”



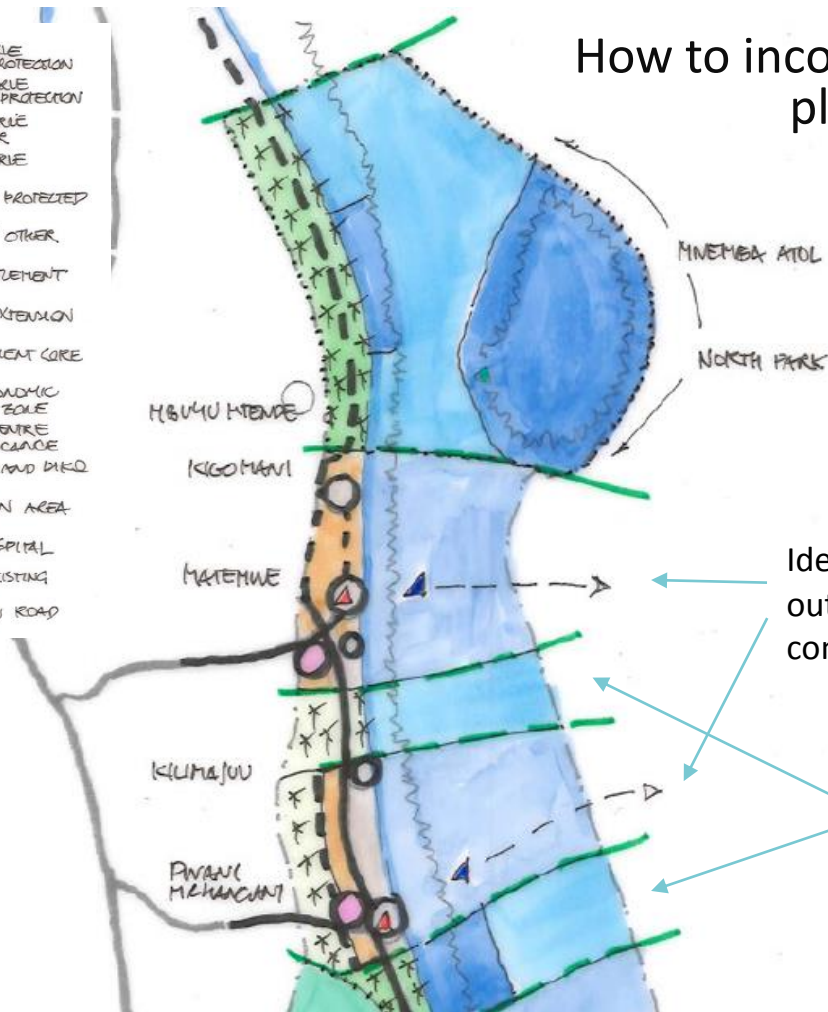
- Participatory mapping in nine villages of the NE coast by villagers
- Typology of mapping: identification of 18 different common activities and values
- Mapping on a printed high-res satellite images (scale), villagers mapping jointly on the image

Mapping coastal values and activities using printed high-resolution satellite images and drone images (for the residents of the villages)



How to incorporate local knowledge into spatial planning process: draft plan

- MARINE RESERVE VERY HIGH PROTECTION
- MARINE RESERVE HIGH PROTECTION
- MARINE RESERVE OTHER
- FOREST RESERVE
- GREEN BELT PROTECTED
- GREEN BELT OTHER
- EXISTING SETTLEMENT
- SETTLEMENT EXTENSION
- EXIST. SETTLEMENT CORE
- PROPOSED ECONOMIC ACTIVITIES ZONE
- HISTORICAL CENTRE OF SIGNIFICANCE
- LANDING SITE AND DIKE
- APPRECIATION AREA
- PROHIBED HOSPITAL
- MAIN ROAD EXISTING
- PROPOSED MAIN ROAD



Identification of "North Park" as the most important area of protection around Mnemba island (biodiversity, fishing, corals etc.)

Identification of key access points in and out from the sea (local services, trade, commerce, fishing etc)

Establishment of buffer zones around more intensively used coastal space

NESAP, Draft,
July 2017
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Instrumental vs. deliberative paradigm in mapping

(Raymond et al., 2014, Ecological Economics)

- Online surveys:
 - Instrumental paradigm stresses individuals and their values, and the collective understanding that emerges from their aggregation
 - Wide (statistical) representativeness of population sought and statistical/GIS analysis of collected data
- Participatory mapping in groups:
 - Deliberative paradigm places emphasis on communication and argumentation to unravel values in a group of participants
 - Social process that involves often both lay and expert stakeholders/decision-makers/scientists, emphasis on participation and collaborative learning
 - Selecting people to act as representatives of their stakeholder group or society as a whole, effective involvement of all stakeholders important (power balance between participants!)
- **Different knowledge systems and ways of identifying and assessing value**
 - Instrumental: contextual values (opinions about worth or importance), objectively measured
 - Deliberative: both transcendental (the broader guiding principles or criteria used to select and justify actions and often implicit, shared and cultural) and contextual values, no claim to be objective
- Outcomes from these processes can be very different!
- Also pragmatic paradigm – aims to combine value elicitation methods, instrumental and deliberative approaches





Stakeholder identification should first focus on institutions, organisations and informal groups, not individuals. Later on, other methods and criteria are needed to identify relevant people in identified institutions. The Snowball Effect can be helpful in this regard.

Handbook for developing visions in MSP, 2018

Who do we involve?

- regional development and planning – municipalities, entrepreneur organisations, companies and Metsähallitus
- fisheries promotional organisations, fishery regions, professional fishing, aquaculture and fishing harbours
- extractive industry – entrepreneurs, organisations and researchers
- international bodies – Baltic Sea countries, especially Sweden, Estonia and Russia
- cultural heritage – the National Board of Antiquities, Military Museum and associations
- national defence – Defence Forces and the Border Guard
- tourism – entrepreneurs, municipalities and developer bodies
- energy sectors – companies and interest groups (offshore wind energy, energy cables and pipelines)
- coastal game – Finnish Wildlife Agency
- maritime industry – industry, logistics and researchers
- conservation – nature conservation and environmental organisations, Metsähallitus and researchers
- authorities – Ministries, ELY Centres and municipal representatives

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-
- Difficult to find a suitable role for citizens in an expert driven process?
Challenges to envision future (scenarios)?
 - Citizen's legislative right to participate to the development of their living environments, seen as a reason to promote citizen participation also to strategic planning (Maritime spatial planning is regulated in the Land Use and Building Act in Finland)
 - Whose knowledge and values count in the process?



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Kiitos!

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