



FSDF Elevation & Depth Theme Roadmap

Currently funded and included in work programs

Required to meet outcome, but not yet funded nor included in work programs of custodians / sponsors

Goals

Outcomes against Areas of Focus

2015

2016

2017

Future Status

	2015	2016	2017	Future Status
Quality <ul style="list-style-type: none"> National coverage elevation datasets will have a 12m resolution, improving to 5m in the vicinity of airfields, and to 1m in urban areas and other areas vulnerable to hazards. Vertical accuracy for national coverage elevation datasets will be no worse than 2m in flat terrain, improving to 10cm in priority areas for modelling water flows. Datasets in the near-shore zone will be able to be seamlessly joined. A legal representation of Australia's coastline at lowest astronomical tide will be completed. Gaps in the shallow water zone will be filled using various techniques such as earth observation. Improve tidal measurements from 50cm to 20cm. 	<ul style="list-style-type: none"> Current Data models and specifications will be published First tranche of user needs for national elevation, coastal zone and bathymetry products will be captured High-resolution LiDAR data will be captured over priority areas in the Murray-Darling Basin 	<ul style="list-style-type: none"> Gap assessment and plans for upgrading published. Techniques using earth observation to improving mapping of shallow water, intertidal zone and benthic structures established. Techniques to improve tidal measurements investigated. 	<ul style="list-style-type: none"> Completion of territorial sea baseline capture. Integration of other coastline representations in areas of significant tidal ranges will be completed Statewide elevation acquisition programs for NSW finalised Investigation into application of TanDEM-X to improve national elevation coverage. Techniques to improve tidal measurements implemented. 	<p>Elevation, tidal and bathymetric data will be seamlessly integrated to better support decision-making in the coastal and nearshore zone.</p> <p>National elevation products will be derived from best available national coverage datasets, improved with more finely-detailed data held by local or state/territory authorities.</p> <p>Datasets supporting intelligent transport and safety, and water modelling, will be co-developed in line with the evolution of elevation information.</p> <p>Improvements in data storage capacities and bandwidth underpin this future state.</p>
Supply Chain <ul style="list-style-type: none"> High performance computing will be used to build national products from the growing number of localised high-resolution LiDAR, nearshore or offshore acquisition projects, or from larger-coverage acquisition programs at a state level. Clear and agreed governance of foundation spatial datasets between land information agencies, marine agencies and other sectors. Data held by local government, state government, the Commonwealth and private providers will be integrated into foundation datasets. 	<ul style="list-style-type: none"> Dependencies on other datasets will be documented High performance computing facility in place to deliver products for Murray-Darling Basin 	<ul style="list-style-type: none"> Integration of best available, high-resolution elevation and bathymetry observations and projects into national dataset Agreed roles of land information agencies, marine agencies and other sectors. 		
Delivery <ul style="list-style-type: none"> Surface and 'bare-earth' models will be delivered as products. Elevation products will be more widely delivered as web services. All products will be easy to find and available for dissemination 	<ul style="list-style-type: none"> 5m coastal DEM products funded by the Climate Change Adaptation will be available Review of National Elevation Data Framework portal business model Generation of products to meet water modelling requirements 	<ul style="list-style-type: none"> Generation of general use national elevation and bathymetry products Implement changes as a result of the NEDF portal/business model review Generation of products to meet civil aviation requirements 		
Policy <ul style="list-style-type: none"> Agreement will be reached with private providers of products on what constitutes "foundation" datasets (and therefore available under minimum restrictive licensing). Agreement will be reached on inclusion of high quality but restricted elevation data into open, national products. 		<ul style="list-style-type: none"> Agreement with custodians of restricted data – minimal restriction on dataset use 		
Engagement <ul style="list-style-type: none"> Engagement with existing reference groups including transport authorities, insurance, water and environmental management authorities, research agencies, and the private sector to establish use cases, improve techniques for observation and management, and confirm governance. 	<ul style="list-style-type: none"> Reference groups established and linked with FSDF 	<ul style="list-style-type: none"> Reference groups continue to supply updated user requirements and visions for longer-term foundation dataset development 		

Sponsor:



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