

AUSTRALIA'S APPROACH TO LICENSING SPATIAL INFORMATION

OUR ENVIRONMENT

We work with others to build our national location information products from a variety of sources, including our own collections, from other government agencies, from the private sector, and from the community.

We want our products to be used for a variety of purposes, to support a wide range of government policies and the running of government, in ways we haven't thought of before.

We've worked with open data since 2001 and to ensure that our national datasets are available openly; the most recent national dataset to be made open is our national addressing dataset.

HOW DO WE GO ABOUT THIS?

Geoscience Australia works with other suppliers of location information to build national geospatial products. We consume that information in three ways:

- The input is already available under an open licence. An example of this is our use of some OpenStreetMap data in the production of our online digital base maps.
- We have collaborative agreements with partners in state and territory governments, and with other Australian Government agencies, to jointly work on improving data content so we can each use the data for our own products. This results in joint intellectual property between governments.
- We have special licence agreements with private companies, including global companies, to incorporate some of their information into our openly-available national products. These licence agreements may have some conditions, such as us only using the parts of the dataset we are interested in.

Where we collect data ourselves, or outsource its collection, we ensure that all data collected can be made available under open licensing, and that IP is vested in Geoscience Australia.

CONSIDERATIONS

There are five challenges that are worth considering by any national mapping agency when utilising others' data for your products, and when encouraging others to use your products.

1. Intellectual property or ownership in data, is a separate issue to licensing, which is in turn separate to pricing. In the end it's not about owning data, it's about the ability of anyone to use the data. Open data does not necessarily mean someone does not have to pay for it, although in practice government policy considers that a taxpayer has already funded the data, so should not have to pay further to access the data.
2. Often custodians are reluctant to release data via open licensing because they are concerned about the quality of their information, and that they open themselves to criticism because their data isn't perfect. We have found the opposite effect to occur in Australia; when a whole range of datasets were made openly available, we could use feedback and critique to argue for maintained or additional funding to improve their quality.

3. Simply making your data “open” is the first step in a long journey to making location information ubiquitous. As more and more data becomes available, users find it increasingly difficult to know which data to use for their purposes. The path we are now embarking on in Australia is to work more closely with users, to both help them work with our open data and gather their use cases to support our ongoing custodianship. We have had experiences where major software development companies pick up open spatial data and try to apply to their use, without understanding any potential limitations surrounding the original capture or purpose of the data. As well as encouraging innovative use, we want to encourage intelligent use.
4. Security concerns are often raised when making some datasets available openly. In Australia, these concerns continue to be focused on datasets describing critical infrastructure such as powerlines and energy generation plants. It is usually the private sector owners and operators of these facilities who raise these concerns. However, often the same data is essential to other needs of government. In Australia, having access to datasets showing powerlines is essential for decision making on where to locate new power generation plants, and to avoid aircraft safety issues particularly in agricultural areas. We overcame this issue by asking our national security agency to assess the risk of making a geospatial powerlines dataset available openly; they concluded that having openly-available datasets showing the location of powerlines did not add to the risk of a physical threat. Having this assessment gave us the authority to make this information available for the greater good.
5. Many open data licences pass on liability of their use to the user, foregoing any ‘authority’ by the custodian. This leads to two adverse outcomes. The first is that not making authoritative data available easily means someone will use a less trustworthy but easier to find dataset. This means poor decisions are made which can have adverse consequences. Think of the consequences where ships from one nation may sail into another country’s waters because they used the wrong information. Secondly, not assuming liability has prevented take-up of open government spatial data by many major commercial companies. Someone has to assume liability somewhere along the supply chain, or at least promote appropriate use of the dataset to minimise risk to the custodian. For some datasets, particularly those with legal aspects such as the cadastre or administrative boundaries, the government does still need to assume liability regarding its accuracy and proper use, as ironically that’s what the dataset was created for in the first place.

CONCLUSION

Geoscience Australia relies upon a number of suppliers in the public and private sectors to create national location information products. Our government also strongly advocates open data policies to maximise the potential of our products for economic and social benefits.

In practice, there is nothing to fear from adopting open data policies. We have found that provided you assume some other responsibilities, working with open data opens up a whole new world of possibilities and opportunities for national geospatial authorities.

Take a more active approach in working with others to understand what they use your data for. This will help you build enduring business cases to your governments for ongoing funding, and show how you support broader government objectives.

Be prepared to put your authority on your datasets, and clearly explain the original purpose and known inaccuracies in your data, so that it is used intelligently and creatively.