

The background features a dark blue gradient with several white circular patterns. On the left, a large circular scale is visible, with numbers ranging from 150 to 260. Other smaller circular patterns with arrows and dashed lines are scattered across the background.

# USING TRAIT DATA TO SUPPORT BIODIVERSITY RESEARCH

CONCURRENT III-C - ROOM 290, 10:30 A.M. - 12:15 P.M.  
HEARST MEMORIAL MINING BUILDING

JOHN LA SALLE, ROBINA SANDERSON, HAMISH HOLEWA, ATLAS OF  
LIVING AUSTRALIA

MODERATOR/TIMEKEEPER: MOLLY PHILLIPS

*Meeting the research challenges of the Anthropocene*

# TRAITS –

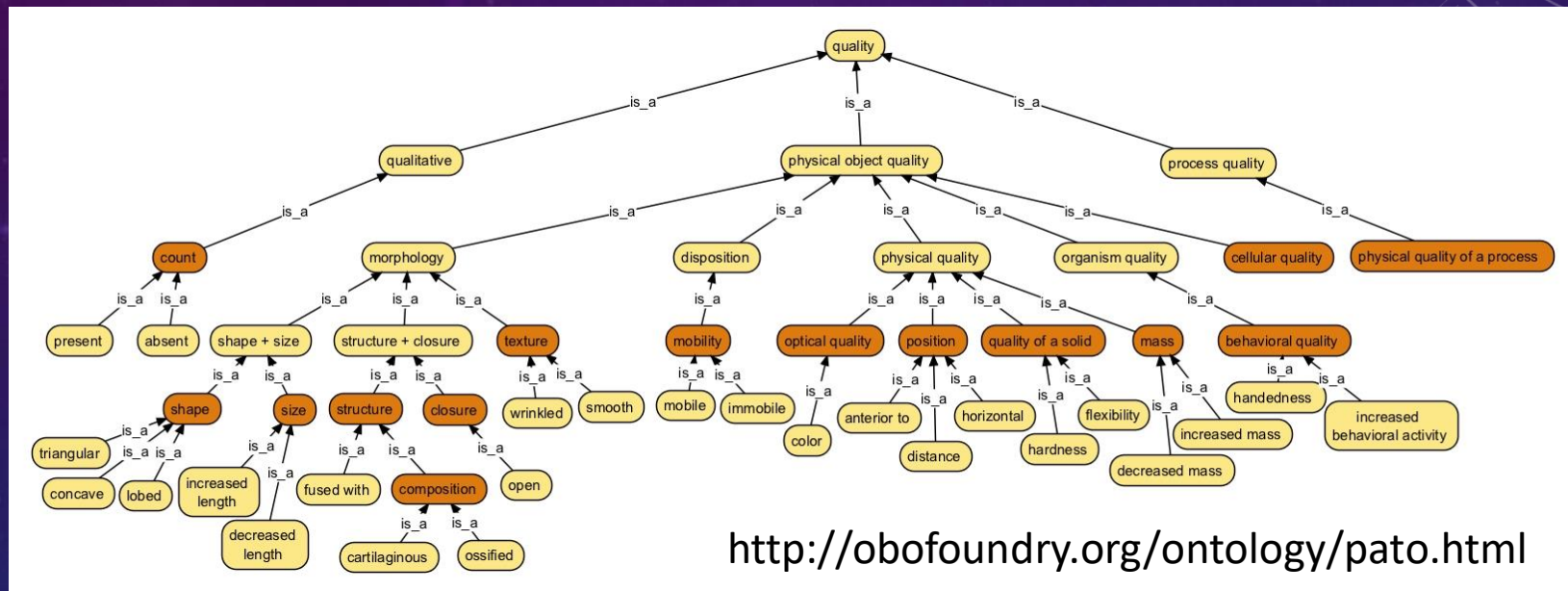
TRY Data Explorer Output      2018-6-5  
Trait List

TraitID	Trait	ObsNum	ObsGRNum	AccSpecNum									
3124	Aboveground woody biomass per ground area	25	25	1									
2137	Absorptive fine root 12 phenol content per absorptive fine root C content	21	21	1									
2120	Absorptive fine root acid hydrolyzable extractives per absorptive fine root dry mass	105	105	35									
2054	Absorptive fine root arsenic (As) content per absorptive fine root dry mass	18	18	6									
2123	Absorptive fine root bound phenol content per absorptive fine root C content	21	21	1									
2098	Absorptive fine root branching intensity by length: number of root tips devided by total absorptive	204	204	182									
2097	Absorptive fine root branching intensity: number of absorptive fine roots per higher order absorptiv	165	165	109									
2055	Absorptive fine root cadmium (Cd) content per absorptive fine root dry mass	18	18	6									
2056	Absorptive fine root calcium (Ca) content per absorptive fine root dry mass	82	82	82									
2134	Absorptive fine root carbon (C) content not hydrolyzable in acid extractives per absorptive fine roo	26	26	20									
2039	Absorptive fine root carbon (C) content per absorptive fine root dry mass	302	280	153									
2273	Absorptive fine root carbon content per ground area	27	27	3									
2272	Absorptive fine root carbon content per soil dry mass	3	3	1									
2057	Absorptive fine root carbon/nitrogen (C/N) ratio	366	344	202									
2108	Absorptive fine root cellulose carbon (C) per absorptive fine root carbon (C) content	3	3	1									
2058	Absorptive fine root chromium (Cr) content per absorptive fine root dry mass	18	18	6									
2124	Absorptive fine root cinnamyl phenol content per absorptive fine root C content	3	3	1									
2117	Absorptive fine root Cl- ion content per absorptive fine root dry mass	6	6	1									
2227	Absorptive fine root color	8	4										
2093	Absorptive fine root conduit cell wall thickness	15	15	5									
2086	Absorptive fine root conduit density: number of conduits per stele cross-section area	15	15	5									
2089	Absorptive fine root conduit diameter	21	21	6									
2059	Absorptive fine root copper (Cu) content per absorptive fine root dry mass	18	18	6									
2075	Absorptive fine root cortex thickness	138	132	104									
2287	Absorptive fine root debris decomposition rate constant	8	8	8									
2165	Absorptive fine root decomposition: fraction of absorptive fine root dry mass not decomposed to orig	108	108	16									
2038	Absorptive fine root diameter	1093	975	282									
2263	Absorptive fine root dry mass fraction in respective root order	63	63	16									
2133	Absorptive fine root dry mass not hydrolyzable in acid extractives per absorptive fine root dry mass	105	105	35									
2051	Absorptive fine root dry mass per ground area	251	227	22									
2135	Absorptive fine root dry mass soluble in nonpolar extractives per absorptive fine root dry mass	105	105	35									
2138	Absorptive fine root dry mass soluble in polar extractives per absorptive fine root dry mass	105	105	35									
2210	Absorptive fine root dry mass turnover	16	16	2									
2211	Absorptive fine root dry mass turnover rate	2	2	1									
2076	Absorptive fine root exodermal wall thickness	18	8	6									
2077	Absorptive fine root exodermis passage cell frequency per length of absorptive fine root circumferen	18	8	6									
2101	Absorptive fine root fractal dimension	34	34										
2126	Absorptive fine root free phenol content per absorptive fine root C content	21	21	1									

Trait list from TRY database (4 June 2018)

# QUALITY & ATTRIBUTE ONTOLOGY (PATO)

## 2,713 TERMS



\*can be used in conjunction with other ontologies such as the Gene Ontology (GO), an anatomical ontology, or environmental ontology. Examples of qualities are red, ectopic, high temperature, fused, small, edematous and arrested.



# TRAIT ANNOTATION WITH ONTOLOGIES

## Traits



Taxon	Anatomy	Quality
species 1	Maxilla	large
	Scales	silver
species 2	Head	flat
	Adipose fin	present

**Anatomy  
ontology  
terms**

**Quality  
ontology  
terms**