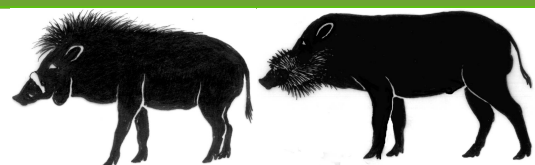


Ecology and Conservation



River crossing and migration of the Bearded pig (*Sus barbatus*) in Central Sarawak, Borneo

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Introduction

The bearded pig (*Sus barbatus*) is distributed from the Malay Peninsular, Sumatra, Borneo and the southwestern Philippines (Corbett & Hill, 1992; Oliver, 1995). In Borneo they can be found in coastal lowlands comprising peat swamp and dipterocarp forest with undulating hills and the mountain highlands (Payne et al., 1985). The bearded pig is an omnivorous animal that forages mainly on seeds of Dipterocarpaceae, Fagaceae, fruits, roots and invertebrates (Davis & Payne, 1982; Payne et al., 1985; Caldecott, 1988). This generalist species is known to utilize a wide variety of habitat types but lives in one location in a stable group for the majority part of the year (Navenec et al., 2016).

The bearded pig has been reported to be mobile and exhibit a variety of aggregation strategies, ranging from solitary and sedentary to mass aggregation with wide ranging migration (Meijaard, 2003; Hancock et al., 2006). The shortage of food resources may force pigs to migrate. Migrations of bearded pig have been reported in Borneo in response to mass fruiting occurrences in Borneo (Caldecott & Caldecott, 1985; Hancock et al., 2005; Wong et al., 2005). The mast fruiting events increases population numbers explosively and the pigs are known to migrate across large areas to feed on the oil rich Dipterocarp seeds (Hancock et al., 2005). The bearded pig is the most sought after wild meat by the non-Muslim natives in Sarawak where it plays significant role socioeconomically especially in sustaining local livelihoods. In Sarawak the bearded pig is not protected outside National Parks, Nature Reserves and Wildlife Sanctuaries. As a non-protected species, it can be hunted for local consumption. However commercial sale of bearded pig in Sarawak is prohibited according to Wildlife Protection Ordinance 1998 where offenders are liable for a fine up to 5000 Ringgit (USD\$1250) while the buyers can be fined up to 2000 Ringgit (USD\$500). Additionally if a native is found in his possession with more than five kilograms of wild meat for his own consumption he will be deemed to have the intention to sell or offer for sale and can be charged up to 5000 Ringgit.

Materials & Methods

Study site

A rapid survey was carried out in Rajang River area from Kapit town to Pelagus National Park. Rajang River (also known as Batang Rejang) is the longest river in Malaysia and the largest river between Sabah and Sarawak, which originates from central highlands of Borneo. The Rajang headwaters drain the northern slopes of the Kapuas Hulu Range and western slopes of Hose and Iran mountains while the watershed of Rajang River drains the districts of Kapit, Belaga, Song, Kanowit, Julau, Sibul, Matu, Daro, Bintangor and Sarikei (Parenti & Lim, 2005). Rajang River drainage basin is about 50,000 km² in area with elevations exceeding 2,000 m (Parenti & Lim, 2005; Staub & Gastaldo, 2012). From a 30 years rainfall data calculation, the typical single-month

