



## Study on the Relationship between the Selected Traits of the Gir Cattle Breeders and Their Knowledge Level about Conservational Practices

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### ABSTRACT

The study was conducted in Ajmer district of Rajasthan, out of 10 tehsils of Ajmer district two tehsils i.e. Bhinay and Bijainagar were selected purposively. Further, four villages from each selected tehsil were identified. From each village 20 respondents were selected randomly. Thus, the entire sample consists of 160 respondents. The field survey was conducted to collect the first hand information on the relationship between the selected traits of the Gir cattle breeders and their knowledge level about conservational practices in the study area. Majority (61.25 per cent) of the livestock owners had medium level of knowledge about conservational practices in study area. The characteristics namely education, mass media exposures, extension contact were positively and significantly correlated with knowledge, whereas, age had negative correlation and highly significant with the knowledge level of the Gir cattle breeders about Gir cattle conservational practices in study area. The variables like land holding, herd size, occupation and annual income were positively and non-significantly correlated with knowledge about Gir cattle conservational practices. Family size had negative and non-significant correlation with knowledge about Gir cattle conservational practices in study area.

**Keywords:** Conservational practice, knowledge, significant, correlation, breeders

There are forty two (42) recognized breeds of cattle in India, in addition to large number of non-descript cattle. In recent times, several of the indigenous breeds suffered decline mainly due to their becoming uneconomical. Draught breeds utility has decreased because of mechanization in agriculture. The indigenous breeds have following merits over exotic breeds viz: Better disease resistance than exotic breeds, more suitable for low input management system, Survive better in local environment, Suitable for draught work and in addition to this existence of superior indigenous breeds can provide valuable research inputs for developing superior breeds. It is therefore important that Indigenous breeds of cattle are conserved, developed and proliferated. Cattle and buffalo genetic improvement will be done taking into consideration the farmers needs,

market and agro-climate and simultaneously conserving the livestock, biodiversity (AHD, GOR).

### MATERIALS AND METHODS

The study was conducted in Ajmer district of Rajasthan, out of 10 tehsils of Ajmer district two tehsils i.e. Bhinay and Bijainagar were selected purposively. Further, four villages from each selected tehsil were identified. From each village 20 respondents were selected randomly. Thus, the entire sample consists of 160 respondents. The data was collected through the personal interview. The relationship between the selected traits of the Gir cattle breeders and their knowledge level about conservational practices in the study area were separately enlisted. To find

out the relationship between independent and dependent variables the Pearson's Product Moment Method suggested by Chandel (1978) for computing correlation co-efficient was used.

## RESULTS AND DISCUSSION

The relationship between the selected traits of the Gir cattle breeders and their knowledge level about conservational practices followed by all the 160 Gir cattle owners were studied and each of them described in sub points as follows.

### Knowledge level of livestock owner regarding conservation of Gir cattle through managerial practices

The data portrayed in Table 1 clearly reveals that majority (61.25 per cent) of the Gir cattle owners had medium level of knowledge followed by 20.62 per cent and 18.13 per cent of the respondent, in category of low knowledge level and high level of knowledge in study area, respectively. Results observed in line with the findings of Pandey *et al.* (2015); Meena *et al.* (2014); Rathod *et al.* (2014); Sharma *et al.* (2009) and Sheokand *et al.* (2002) but in contrast with the findings of Prakash *et al.* (2011) and Saha *et al.* (2010).

**Table 1:** Knowledge level of Livestock owner regarding conservation of Gir cattle through managerial practices

(n = 2)

Sl. No.	Existing practices	Frequency	Percentage
1	Low level (Below 6.55 score)	33	20.62
2	Medium level (6.55 to 10.56 score)	98	61.25
3	High level (Above 10.56 score)	29	18.13
<b>Total</b>		<b>160</b>	<b>100.00</b>

### Relationship between the selected traits of the Gir cattle breeders and their knowledge about conservational practices

Conservational practices are a composite factor involving several components. Among them Knowledge regarding conservational practices of animal Bio-diversity, attitude

towards conservational practices of animal Bio-diversity, ability in planning, ability to make rational decisions, ability to mobilize resources, ability to coordinate activities, timely adoption, efficient use of resources, competence in evaluation and ability in rational conservational practices are important. The coefficient of correlation of each of the personal, socio-economic and psychological variables with the Gir cattle breeders and their knowledge about conservational practices of animal Bio-diversity are shown in Table 2.

**Table 2:** Relationship between the selected traits of the Gir cattle breeders and their knowledge about conservational practices

Sl. No.	Independent variables	Coefficient of correlation (Ajmer)	
		('r' value)	Significance
1	Age	-0.469	**
2	Education	0.284	**
3	Herd size	0.151	NS
4	Land holding	0.066	NS
5	Family size	-0.083	NS
6	Occupation	0.058	NS
7	Annual income	0.121	NS
8	Mass media exposure	0.404	**
9	Extension contact	0.413	**

\*Significant at 0.05 level of probability; \*\* Significant at 0.01 level of probability; NS – Non Significant.

### Age and knowledge

Correlation between age of the Gir cattle breeders and their knowledge level regarding Gir cattle conservational practices was found to be negative and highly significant ( $r = -0.469$ ) for respondents in study area (Table-2). The result reveals that age is an important variable which influence the knowledge regarding Gir cattle conservational practices. This finding is in conformity with the findings of Patel (2007); Singh *et al.* (2012) and Jeelani *et al.* (2014).

### Education and knowledge

Knowledge level of the Gir cattle breeders had positive and highly significant correlation ( $r = 0.284$ ) with their level of education for the respondents in study area (Table

2). This indicates that education is an important variable which influences the knowledge regarding Gir cattle conservational practices of the Gir cattle breeders. It also indicates that as the educational level of the respondent increases, knowledge level also increases. This finding is further strengthened by the result reported by Patel (2005) and Singh *et al.* (2012).

#### **Herd size and knowledge**

It is evident from Table 2 that herd size had positive correlation ( $r = 0.151$ ) and non significant with knowledge level of the Gir cattle breeders about conservational practices in study area. It meant that herd size is an important variable which play crucial role in improving their level of knowledge. Similar finding was reported by Saha *et al.* (2010).

#### **Land holding and knowledge**

It is evident from Table-2 that land holding of the Gir cattle owners was found positively and non-significantly correlated ( $r = 0.066$ ) with knowledge level of the Gir cattle owners about conservational practices in study area. Similar finding was reported by Temkar (2000).

#### **Family size and knowledge**

Correlation between family size of the Gir cattle breeders and their knowledge level regarding Gir cattle conservational practices was found to be negative and non-significant ( $r = -0.083$ ) for respondents in study area (Table 2). This reflects that increasing family size did play a role in decreasing the education of livestock owners due to this reason there is decrease in knowledge level about conservational practices.

#### **Occupation and knowledge**

Results indicate that occupation had positive and non-significant ( $r = 0.058$ ) relationship with knowledge level about Gir cattle conservational practices of the Gir cattle breeders (Table 2). This may be due to the reason that the person who is in occupation might be more educated and has more exposure to changes in society regarding Gir cattle conservation, which influence his knowledge level. Similar finding was reported by Sai (2002) and Manikpuri *et al.* (2004).

#### **Annual income and knowledge**

It is evident from Table 2 that annual income of the Gir cattle breeders was found positively and non-significantly correlated ( $r = 0.121$ ) with knowledge level of the Gir cattle breeders about Gir cattle conservational practices in study area. This reflects that annual income did play a role in increasing or decreasing the knowledge level about Gir cattle conservational practices. Similar finding was reported by Saha *et al.* (2010).

#### **Mass media exposure and knowledge**

Mass media exposure had highly significant and positive ( $r = 0.404$ ) relationship with knowledge level of the Gir cattle conservational practices (Table 2). It meant that mass media exposure is an important variable which play crucial role in improving their level of knowledge about new conservational practices. The findings of Singh and Nande (2002) and Patel (2005) are in agreement with the present findings of relationship between exposure to mass media and knowledge level about Gir cattle conservational practices.

#### **Extension contact and knowledge**

Correlation between extension contact of Gir cattle breeders and their knowledge level of the conservational practices was found to be positive and highly significant ( $r = 0.413$ ) in study area. This means that extension contact is a crucial variable which play an important role to influence the knowledge level of the Gir cattle owners. This finding is strengthened by the result reported by Patel (2005).

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