

Trustworthiness and competitive altruism can also solve the “tragedy of the commons”[☆]

Pat Barclay*

Department of Psychology, McMaster University, 1280 Main Street West, Hamilton, Ontario, Canada L8S 4K1

Received 4 November 2003; accepted 19 April 2004

Abstract

The benefits of a good reputation can help explain why some individuals are willing to be altruistic in situations where they will not receive direct benefits. Recent experiments on indirect reciprocity have shown that when people stand to benefit from having a good reputation, they are more altruistic towards groups and charities. However, it is unknown whether indirect reciprocity is the only thing that can cause such an effect. Individuals may be altruistic because it will make them more trustworthy. In this study, I show that participants in a cooperative group game contribute more to their group when they expect to play a dyadic trust game afterwards, and that participants do tend to trust altruistic individuals more than nonaltruistic individuals. I also included a condition where participants had to choose only one person to trust (instead of being able to trust all players) in the dyadic trust game that followed the cooperative group game, and contributions towards the group were maintained best in this condition. This provides some evidence that competition for scarce reputational benefits can help maintain cooperative behaviour because of competitive altruism.

© 2004 Elsevier Inc. All rights reserved.

Keywords: Evolution; Competitive altruism; Game theory; Trust; Public goods

1. Introduction

Altruism towards unrelated individuals has puzzled evolutionary biologists for decades, and several theories provide possible explanations for its existence. Theories of direct

[☆] This paper is based on the Young Investigator Award winning presentation at HBES2003.

* Tel.: +1-905-525-9140x24867.

E-mail address: barclapj@mcmaster.ca (P. Barclay).

reciprocity (Trivers, 1971) and indirect reciprocity (Alexander, 1987) suggest that organisms can succeed by reciprocating altruistic acts towards other altruists. Direct reciprocity occurs when individuals reciprocate generous acts towards others who have been generous to them in the past. Indirect reciprocity occurs when individuals provide benefits for others who have been generous to anyone, and in turn are rewarded for this benevolence by individuals other than the recipients. Many computer simulations and experimental games have shown that some forms of direct and indirect reciprocity can allow for the evolution of altruism, and people actually do engage in direct and indirect reciprocity (see especially Axelrod, 1984; Nowak & Sigmund, 1998; Wedekind & Milinski, 2000; but see also Leimar & Hammerstein, 2001).

However, these theories by themselves cannot account for altruistic acts that cannot be directed towards particular individuals, such as the provision of public goods. A public good is something that people have to incur costs to provide and yet all members of the group benefit from it whether or not they helped provide it (Davis & Holt, 1993), so the public good is open to exploitation by free riders. Examples of public goods include group protection, irrigation, and any collective action project. Individuals have an incentive to not provide public goods because the benefits of providing them are spread among many people, whereas only the altruists bear the cost. Thus, the provision of public goods is very much like the classic “tragedy of the commons” situation introduced by Hardin (1968). One would expect that altruism in such situations would be selected against, and yet many studies demonstrate that humans are willing to contribute to public goods (e.g., Fehr & Gächter, 2000).

People may be altruistic in these situations if there is a chance that they will earn a good reputation that will later be repaid in direct or indirect reciprocity (Alexander, 1987). Supporting this, Milinski, Semmann, and Krambeck (2002) had participants play an experimental game where they alternated between the opportunity to donate money to other players (an indirect reciprocity game from Wedekind & Milinski, 2000) or the opportunity to donate to a public good. They found that people were more likely to contribute to public goods when they expected future indirect reciprocity games, and that participants donated more often in the indirect reciprocity game towards people who contributed to the public good. However, the rewarding of altruists (one component of indirect reciprocity) is not the only way in which an individual might benefit from a reputation for altruism. People often engage in dyadic relations in which they have to trust another person, and competition to form these cooperative partnerships could also account for the importance of reputation. The present study examines whether humans are more willing to trust altruistic individuals than nonaltruistic individuals in a situation where they might be cheated. Alternately, people might not do so, because it would then become possible for individuals to send a dishonest signal by being generous in order to deceive others into trusting them. This would reduce the effectiveness of altruism as a signal of trustworthiness, such that people do not trust altruists any more than nonaltruists.

Given that coalitions and reciprocal altruism are integral parts of human interaction and carry great potential benefits and costs, we can expect careful choice of cooperative

متن کامل مقاله

دریافت فوری ←

ISIArticles

مرجع مقالات تخصصی ایران

- ✓ امکان دانلود نسخه تمام متن مقالات انگلیسی
- ✓ امکان دانلود نسخه ترجمه شده مقالات
- ✓ پذیرش سفارش ترجمه تخصصی
- ✓ امکان جستجو در آرشیو جامعی از صدها موضوع و هزاران مقاله
- ✓ امکان دانلود رایگان ۲ صفحه اول هر مقاله
- ✓ امکان پرداخت اینترنتی با کلیه کارت های عضو شتاب
- ✓ دانلود فوری مقاله پس از پرداخت آنلاین
- ✓ پشتیبانی کامل خرید با بهره مندی از سیستم هوشمند رهگیری سفارشات