

The Impact of Charity Ratings on the Behavior of Donors and Nonprofits: The Efficacy of Transparency

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This study uses Charity Navigator ratings and institutional data to examine whether ratings stimulate behavioral changes for charities of various categories of mission and sizes. Rating agencies can provide charities with information about comparative financial measures and possibly provide an incentive for charities to improve their behavior in how they manage their income and expenses. Comparisons of mobility within the ratings and regressions on ratings changes show that there is little to no financial efficiency improvement from year to year in an effort to improve ratings. This is counter to much of the theory and previous empirical work. A model is presented to explain the behavior of nonprofits as a rational decision in light of their beliefs about the importance of ratings in stimulating or retarding donation decisions by donors.

Introduction

There are a number of charity ratings agencies that provide information to help donors make decisions about how to allocate their resources. In addition, these ratings, in identifying inefficient charities, may provide an incentive for charities to improve efficiency. In the past data on the operation of nonprofits was inaccessible to the public, however, that information problem has been alleviated in recent years with the creation of charity watchdog organizations like Charity Navigator and Charity Guide. They serve as information intermediaries whereby they lower the cost of information to donors and charities. The information is used to make more efficient decisions about the allocation of donations with the result of incentivizing greater efficiency from the nonprofits. One measure commonly used to evaluate efficiency is expense ratios, especially administrative and fundraising ratios. It is generally believed that the lower the ratio the better.

Nonprofits vary from other firms in that they cannot distribute profits to owners or managers and are legally bound to limit expenses to “reasonable” costs of operating including salaries. Generally nonprofits are thought to have a lot of inefficiency or organizational slack in their management due to the lack of a profit motivation. However, there is competition between nonprofits for donors. Charity ratings are one tool that can be used by donors to allocate funds and by nonprofits to distinguish themselves from their competitors for the scarce resources of donations. In this paper the behavior of different ages, sizes and categories are examined to determine whether or not they improved or maintained efficiency in order to respond to the measurement criteria of the charity ratings. The data studied is from Charity Navigator from 2004-2009 and includes information about ratings, category of mission and net assets with the addition of the age of the charity. That overarching question studied in this paper is: Do

nonprofits change their behavior in response to charity ratings? If a charity is low rated, will they respond with changes in order to raise their ranking? Will a highly rated charity maintain or improve their financial practices in order to maximize their rating.

The efficacy of an information based regulatory scheme has two requirements. First that information is available to users at low costs and, second, there is a mechanism for enforcement, the belief that negative information will result in a negative outcome. The findings of this study imply that charities are not generally responsive to their ratings. This implies that there is not an effective mechanism for enforcement in this situation.

Section 1 introduces the background and theory of the nonprofit sector. Section 2 presents theory and empirical evidence on the behavior of nonprofits. The rise of charity rating agencies is covered in Section 3. Sections 4 and 5 examine donor behavior to ratings and the corresponding theory and literature on charity behavior in response to ratings. Section 6 presents the data and results. Finally, Section 7 has concluding remarks.

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The Nonprofit Sector

The nonprofit sector is a large and growing¹ portion of the U.S. economy. Over 1.4 million nonprofits were registered with the IRS and active in 2009. Of these, the largest category

¹ The growth in nonprofit organizations over the last 20 years has been disproportionately concentrated in smaller nonprofit organizations such as community development organizations, job training agencies, emergency assistance programs, cultural organizations and community mental health organizations.

is 501(c)(3) public charities such as social services, health care, education and arts groups to which individuals, corporations and foundations can make tax-deductible donations. This category included over 1 million organizations which accounted for 70 percent of registered nonprofits. These public charities reported \$1.4 trillion in revenue and expenses and \$2.53 trillion in assets in 2009 (Roeger, Blackwood, & Pettijohn, 2011).

Nonprofits, despite the name, are not prohibited from earning profits. They simply must use any surplus for funding future programs and services or distribute it to someone who does not have a controlling interest as an officer, director or member of the institution. This is called the nondistribution constraint (Hansmann, 1979). Nonprofit “owners” are allowed to control an asset and transfer the asset to others but are not allowed to profit from it. Even within the limitations on their property rights², nonprofit organizations can behave in ways that benefit their managers and employees by providing them with perks and other non-compensatory benefits. While charities are prohibited from distributing the organization’s income to individuals with organizational control, under Section 501(c)(3) charities are permitted to pay for ordinary and necessary expenditures associated with the course of operations. This includes reasonable compensation to employees.

The question then becomes: what is considered “reasonable” compensation? The term “reasonable” is defined by the IRS as “the value that would ordinarily be paid for like services by like enterprises under like circumstances.”. All sources of compensation are considered, including salary, benefits, and retirement plans. Compensation is presumed to be reasonable

² According to Ben-Ner and Van Hoomissen there are three components of property rights, the right to control an asset, the right to retain income generated from the use of the asset and the right to sell or dispose of the first two rights (Ben-Ner & Van Hoomissen, 1991).

unless proven otherwise, provided the organization follows a set of standard procedures outlined by the IRS but implemented by the charity's Board of Directors.

The nondistribution constraint combined with statutes that require a nonprofit to have "reasonable" operating costs and compensation for employees can result in "better" outcomes for nonprofits than a for-profit firm while not necessarily efficient. If one wishes to provide mosquito nets for individuals in Africa, it would be extremely expensive to purchase the nets oneself and then travel to Africa to deliver the nets in person. Instead one can donate money to a nonprofit with a weak guarantee that the entire donation will not be going into the pockets of the owners or managers, but will be used to further the mission of the organization. The ability to collect tax-deductible donations is a primary benefit of a firm's status as a nonprofit.

In the case where the deliverable is unobservable or is very costly to observe, nonprofits can be a more efficient solution than for-profits (Easley & O'Hara, 1983). However, even when products and services can be easily observed, such as public television, the marginal impact of an individual donation cannot be measured (Ellman, 1981). When one interacts with nonprofits which rely on the sales of goods and services for income there is not a problem with measuring the marginal impact of the purchase of an item. If one pays country club dues or a hospital bill, a product has been received in exchange. Lack of information about the marginal impact of donations is inescapable for both the donors and the charities.

Behavior of Nonprofits

One of the basic elements of the theory of the firm assumes that firms maximize profit. Most of the models of the behavior of nonprofit firms have been ones in which, bound by the nondistribution constraint, there is no reason to believe that profit maximization is a realistic motivator for managers. In the literature there are four maximands considered as reasonable

possibilities, quantity of services, quality of services, budget, and financial interests of a non-controlling party.

Maximizing the quantity of services seems to be a reasonable goal for managers who believe that they are providing a valuable service and wish to serve as large a population as possible. Models that maximize the quality of services or some other qualitative aspect of an organization's mission would make sense for managers who derive satisfaction from putting forth an exceptional product or service even if it is not serving the broadest population. This objective could result from managers who wish to change the preference and consumption of others³ or those who wish to seem trustworthy through provision of high quality service or goods despite the opportunity (Steinberg, 2004).

Maximization of budget without regard to the associated costs might be chosen as a goal because it could provide the best trade-off between quality and quantity maximization or perhaps because it is a quantifiable measure for managers to measure their own performance regardless of the outcomes of service provision (Tullock, 1966). There might also be a preference on the part of the manager for the prestige or higher salary that generally comes with working for a larger organization.

There are also models of nonprofit firms in which there are financial stakeholders outside of the firm whose interest might be taken in to account. An example of this is a nonprofit hospital aimed at maximizing the financial interests of the doctors who work at but not for the hospital.

³ Many nonprofit organizations providing education, health and social services have historically been started by religious or other ideological groups (James, 1990). It is not surprising that service providing nonprofits started by religious groups would focus on maximizing faith measured either by quality or quantity rather than profits.

Another theory of the behavior nonprofit organizations includes entrepreneurial decision-making by an individual who is interested in founding, maintaining or transforming a non-profit (Steinberg, 2004). The objectives of nonprofit organizations are determined by the objectives and characteristics of the individuals involved who establish both the formal and informal rules by which the organizations behave. Different individuals opt for different sectors and they can be sorted by the decisions that they make. Ideological entrepreneurs will disproportionately select the nonprofit form. (Rose-Ackerman, 1996) If a nonprofit entrepreneur is independently wealthy, can attract donations, or merely break even, then creativity, experimentation or idiosyncracies can be better accommodated in the nonprofit form.

Of course, there are nonprofit firms who try to maximize two or more of these goals at the same time. Additionally, objectives can be influenced by Boards of Directors, employees, managers, donors and external factors that can result in the lack of clear goals and objectives for a nonprofit organization. Empirical studies have suggested that health nonprofits tended to be budget maximizers while those in social welfare , education, and the arts were service maximizers (Steinberg, 1986), (Brooks, 2005). In a market with many for-profit hospitals, nonprofit hospitals are more likely to offer relatively profitable services than those in areas without profit maximizing competition (Horwitz & Nichols, 2007). There is no one size fits all answer to the behavior of nonprofits.

One of the most critical characteristic of nonprofits is that they are virtually insulated from both marketplace competition that disciplines managers of private firms and electoral constraints faced by politicians in the public sector. Nonprofits have no incentive to minimize costs and maximize output other than the self-imposed discipline of directors and managers.

Fraud and gross mismanagement are hard to conceal and tend to be made public by the press⁴, however, inefficiency is another matter, as Tullock (1966) says:

Inefficient operation of a charity is not a crime so the police and other law enforcement agencies will not be interested in it. Rarely would it make a good enough story to interest the newspapers. Under the circumstances it is unlikely that the donor will be embarrassed by an "exposure" of the inefficiency of the charity to which he makes gifts. He would, therefore, be irrational to invest significant resources in attempting to determine the efficiency of the charity before he makes his gift. His satisfaction from the gift will be little effected if it is actually badly run. One particular form of inefficiency for a charity would be the investment of "too much" resources in promotional activity. This would, however, not reduce the satisfaction of the donor, indeed it should increase it unless it is forcefully brought to his attention that too much is being spent on this aspect of the organization's activities. Since "too much" is a vague concept, this is unlikely under present circumstances (p.150)

Nonprofits may not be efficient because they don't have to be. In an environment where nonprofits are prohibited from distributing surpluses, an incentive exists for managers to increase their own satisfaction by acquiring more staff, raising internal salaries above for-profit levels, or adding equipment. This causes nonprofit expenses to rise relative to for-profits and dissipates any surpluses that nonprofits might earn. As with most enterprises, there exists a principal-agent problem. Managers and employees will partially pursue their own self-interests rather than the mission of the organization. Incentives are needed to ensure that what is beneficial to the mission of the organization is in alignment with the self-interest of the individual.

One difference between nonprofits and for-profit endeavors is that the nonprofit has a stated mission other than maximizing financial return to shareholders. In a for-profit company the profit is either held in reserve, distributed or used to improve and expand the existing business for future profitability. The only way for a nonprofit to fulfill its stated goals is to

⁴ While the stated mission of many large nonprofits may be noble, there have been many examples recently of nonprofit mismanagement, including the American Red Cross and our local United Way.

spend every additional dollar not needed to meet cash flow requirements on programs towards its mission. As will be exhibited in the data and results however, nonprofits accrue many more assets than might be seen reasonable if viewed with the expectation of zero surplus except accidentally or for cash flow purposes. Financial history will show the peaks and valleys of cash flow and enable a competent manager to budget effectively. For-profit businesses hold sales in order to stimulate their revenue. In the case of unexpected expenses, charities like the Red Cross hold fundraising drives and solicit for specific purposes. A windfall can be spent as soon as a good opportunity is found or worked into the next year's budget at the latest.

Only a negligible number of charities have a zero surplus each year. Asset accumulation can act as a source of subsidy, allow for future allocations, as a hedge against risk and serve as measure of financial success (Chang & Tuckman, 1990). The justification for a charity holding assets while continuing to raise funds has to be evaluated on an item by item basis. All assets are equal on the balance sheet but some assets are more equal than others when it comes to value. A charity that needs office space might be better off owning the building that they occupy rather than leasing. A lease includes payments for taxes which a charity might not pay as an owner. Additionally, there is a potential upside in appreciation for real estate that would be to the benefit of the charity and its beneficiaries in the long run. This same logic might apply to autos and equipment if the items are either specialized for use by the charity or would be more cost-effective as a purchase rather than a lease or reimbursement.

Charities have an obligation to fulfill their mission but also to keep their charity sustainable for the long term. University endowments ensure the continuation of the institution

long into the future.⁵ In the same way, charities holding assets for the long-term ensures the future and guards against financial shocks. It makes sense that charities be evaluated based on performance in fulfillment of their mission and management decisions made for that purpose. Since outcomes are difficult to observe and measure, nonprofit managers might often make decisions based on financial measurements which are more available and quantifiable. There are three primary areas of measurement, fundraising efficiency (ratios representing outputs per input), public support (annual donations) and fiscal performance (ratios of total revenues or total contributions to expense) (Ritchie & Kolodinsky, 2003). Although limiting administrative costs is generally thought to be a positive attribute, there can be drawbacks. Low administrative costs can constrain the management capacity of a nonprofit in the face of any kind of fiscal distress such as lost grants, fundraising downturns or emergency expenses (Lohmann, 2007). If there are no extraneous costs to cut then it is difficult to balance a budget only on the income side. If a charity must increase its income then it is important for it to know what influences donation decisions.

Charity Rating Agencies

Given that information about the marginal impact of a donation is unavailable, donors rely on other measures of effectiveness to evaluate charities. Nonprofits with at least \$25,000 in gross receipts have had federal reporting requirements consisting of the IRS Form 990 since the 1980s. Prior to 1996 a donor wishing to evaluate the tax return of a charity had to visit the

⁵ Harvard has an estimated endowment of \$32 billion which if they maintain an annual operating loss of \$130 million as they did in 2011 will ensure that they remain in business for at least another 285 years (Harvard Annual Report 2011) George Mason University has an estimated endowment of \$45 million which if they continue to operate similarly to their 2010 operating loss of \$141 million will mean that GMU can remain in existence for about 4 months without any additional revenue.

organization in person to obtain a copy. Since 1996 charities have been required to provide copies on request or on a website. The National Center for Charitable Statistics (NCCS) is the national repository of data on the nonprofit sector in the United States. Its mission is to develop and disseminate high quality data on nonprofit organizations and their activities for use in research on the relationships between the nonprofit sector, government, the commercial sector, and the broader civil society. “NCCS | Data & research on the US Nonprofit Sector,” 2011) The NCCS information is based on the tax forms filed annually by charities with the IRS.

Even with the increased accessibility of information there remained an asymmetric information problem on the part of donors. Charity evaluations appeared in the early 1990’s as institutions to correct a market failure and as a supplement to the government disclosure requirement. The charity rating agencies have emerged on as web-based organizations in the past ten years. They provide context and the ability to compare charities to each other. Three of the largest rating agencies are the Wise Giving Alliance, Charity Watch and Charity Navigator. The Wise Giving Alliance, which is affiliated with the Better Business Bureau, is the oldest of the raters and has the most comprehensive approach, using quantitative and qualitative analysis to pass or fail 500 national charities. Charity Watch is a service of the American Institute for Philanthropy and reviews over 600 charities and gives them a letter grade of A to F. Charity Watch provides charity grades online for some organizations for free and publishes more thorough reviews in paper form for its members. Charity Navigator is the largest of the three with over 5500 charities rated with a numerical score which is then condensed to a 4 star rating system. It is data from Charity Navigator that is used in this paper. Appendix A outlines the methodology for ratings used by Charity Navigator.

The charity watchdogs are criticized for their reliance on simple analysis and ratios of efficiency, while ignoring program effectiveness. There are limits to the ability of evaluators to accurately rank charities. There are a variety of charitable organization structures and the financial measurements that may apply for some organization but not for others. The rating agencies generally have not addressed management, governance quality or transparency (Lowell, Trelstad, & Meehan, 2005). In addition, the time contributions of volunteers as well as intangibles such as reputation and board competence are often not included in evaluations.

It has been suggested that it would be better for a donor to use multiple rating sources because each system of evaluation is biased in its own way. The Charity Watch and Charity Navigator ratings have been found to be highly correlated (both based on fundraising efficiency and program spending) while the Wise Giving Alliance ratings are not (Stork & Woodilla, 2007). Criteria vary between ratings services, making it difficult for a donor to understand the ratings and making it difficult for a charity to satisfy the differing criteria. Another problem with ratings services is that donors cannot clearly evaluate the competence or motivation of the evaluator. Some ratings services charge for their information, some evaluate a large number of companies and others rank fewer. Ratings companies pick and choose which companies they evaluate so can be biased by political affiliation or other reasons.

There is criticism of Charity Navigator for encouraging charities to withhold funds instead of dispersing them. Their ratings system encourages charities to keep assets in reserve that total as much as their annual budget -- and more for certain types of charities with big ongoing expenses such as museums and schools (Bialik, 2008). However, any organization that has more than five years' worth of expenses in reserve gets an automatic F from Charity Watch ("CharityWatch Rating Criteria," 2011). They also consider financial numbers, but limits the

number of groups they cover in order to try and dig deeper in to the data and uncover charities who try to game the system by reassigning overhead costs to programming or other inappropriate accounting procedures,

All major charity ratings are based on the 990 forms filed with the IRS. The practice of how tax forms are filled out could be a major source of error in ratings. In 1999, The Urban Institute reported that 59% of 58,000 charities that received public donations either reported zero fundraising expenses or left the fundraising line blank (“The Urban Institute | Nonprofit Statistics,” 2011). However, in a comparison of tax returns with audited financial statements it was found the tax forms exhibited somewhat lower but reasonable consistency with the audited statements.⁶

Donor behavior

In an ideal world, in order to maximize value, donors should identify a charity with the highest expected marginal benefit per marginal dollar contributed and make their entire contribution to that one charity. Individual donors would bear the risk of being wrong , but if everyone were willing behave in that way then all would be better off. This assumes that donors are unbiased in their expectations about the marginal impact of their donations but cognitive biases in decision making can lead to systematic errors in making donations and a less than best result. (Baron & Szymanska, 2010)

⁶ The same data showed that In general, small organizations showed greater consistency in financial reporting than large organizations, and human services and health organizations showed greater consistency than those in education or arts (Froelich, Knoepfle, & Pollak, 2000).

There is much in the literature about the factors influencing donors. Large organization size, large board size, and a high fundraising ratio were found to be positively related to public support⁷ while price⁸ was found to be insignificant (Chen, 2009). Aggressive communication of missions appears to be an even more powerful driver of contributions than fiscal performance (Frumkin & Kim, 2001). Okten and Weisbrod found that fundraising expenditures have two countervailing effects on donations. They increased donations directly, arguably by reducing information costs for donors, but they decreased contributions indirectly, by increasing the price. They reported that total elasticity of donations with respect to fundraising was generally positive (Okten & Weisbrod, 2000). However, depending on the samples examined, fundraising and administrative expenses have also shown a negative association with donations (Tinkelman & Mankaney, 2007). For many nonprofit organizations, donations are the main source of revenue. Even though nonprofits are not competing for profit, they can still be competitive in the quest for donations. As evidenced in the previous studies, public support has been shown to be affected by size, board size, fundraising expense, nonprofit mission, government funding, and price

Some recent studies measure the impact of charity ratings on donor behavior. There is evidence that positive ratings increase donor's contributions to a nonprofit, however negative ratings do not seem to matter (Sloan, 2009). However, Sloan used the ratings of a smaller rating agency of New York charities. This Sloan result could be due to lack of knowledge by the donors, lack of belief in the ratings or a preference for a charity due to other considerations. A study using Charity Navigator ratings and a one year lag between ratings and donations, found a directionally consistent percentage change in contributions (Gordon, Knock, & Neely, 2009).

⁷ The total donative support that a nonprofit organization receives over a one-year period from individuals, corporations and foundations is called public support.

⁸ The cost to provide program service, generally calculated the ratio of total to program expenses.

When looking at ninety nonprofits rated by Charity Navigator from a similar period and using a two year lag to allow for the time between the end of the fiscal year, the 990 filing, and review by Charity Navigator, Szeper and Prakash found no change in donor giving in response to ratings. The lack of change is attributed to the fact that goodwill and reputation are more important to their donors who have a greater understanding of the impact of the charity services than does a rating agency (Szper & Prakash, 2010). In their examination of ratings from the American Institute of Philanthropy (currently known as Charity Watch) Chhaochharia and Ghosh (2008) find that the lowest rated charities have significantly less donations than charities with the highest rating. However, others studying the same data did not find the same link between rating and donations (Silvergleid, 2003). These studies contribute to our understanding of the impact of charity ratings on donations but don't speak directly to the behavior of the charities in response.

Charity Behavior in Response to Ratings

The influence of charity ratings on donor behavior has been studied with mixed results, but ultimately regardless of whether charity ratings influence donors, the next move in response is from the charity itself. It is possible that accountability standards could negatively affect nonprofits. It could be harmful for a nonprofit if accountability leads to short-sightedness valuing the short run over the long run and ratings more than other measures of outcomes and relationships (Ebrahim, 2005). Negative effects might occur if accountability is used as a method for control or to justify the desires of managers rather than serving the needs of the beneficiaries (O'Dwyer & Unerman, 2008). Greater transparency magnifies the effects of financial accountability, in the past tax returns and financial statements were technically

available but only at a cost, now with a few keystrokes anyone can view a nonprofit's financial information.

In a study of law school rankings, it was shown that public awareness affected the behavior of law schools as they modified their practices, resources and priorities to meet the criteria of the ranking system (Espeland & Sauder, 2007) The question remains whether the criteria of the law school rankings correlates with a higher quality product. Schools have been shown to respond to accountability incentives by boosting overall performance and introducing substantive policy and practice changes aimed at improving performance but also by engaging in strategic behavior (Figlio & Kenny, 2009).

In this paper, the response of the charities to rankings is examined. If managers believe that charity rankings matter whether the reason is a change in public support, feedback from stakeholders or a response from governmental bodies in the dispersal of grants, they have the ability and discretion to make decisions that directly affect the outcome of their organization's financial performance each year. In response to a low ranking, manager might make efforts to improve financial management to better satisfy the criteria of the ratings agency. Chhaochharia and Ghosh (2008) show that that there is a significant positive relationship between ratings in the current period and fundraising expenditures in the next period in their examination of ratings from the American Institute of Philanthropy (currently known as Charity Watch) . Szeper and Prakash (2010) conducted interview with nonprofits from which they suggest that the importance of the Charity Navigator ratings is limited.

...for donations, nonprofits rely much more on the ties that they have in the local and business communities. Moreover, nonprofits believe that community members who support their organizations have a more nuanced understanding of their work than the Charity Navigator ratings are able to convey. In other words, information asymmetries between

the donors and nonprofits are not as severe as the academic literature suggests. Nonprofits put significantly more emphasis on goodwill and reputation in the community than they do on online ratings. As a result it is not surprising that the ratings do not impact donor contributions or primary revenue (Szper & Prakash, 2010).

That is what motivates the overarching question studied in this paper: Do nonprofits change their behavior in response to charity ratings? In order to study this question empirically a set of data on Charity Navigator ratings from 2004-2009 is used. Based upon theory and previous studies the following four facts are assumed. First, because ratings are primarily measures of spending, nonprofits have the ability to change their behavior in order to influence the areas that are being measured by the rating agency. Second, regardless of any effect on level of donations, nonprofits prefer higher ratings to lower ratings. Third, based on the first two facts, charities will modify their behavior to obtain the higher rating. Fourth, not all charities are the same, however there are common behaviors within the various categories of charities and different sizes and ages of charities. Based on these assumptions it is expected that there will be a change in behavior from charities in response to ratings in the attempt to either raise or maintain the rating.

Data and Results

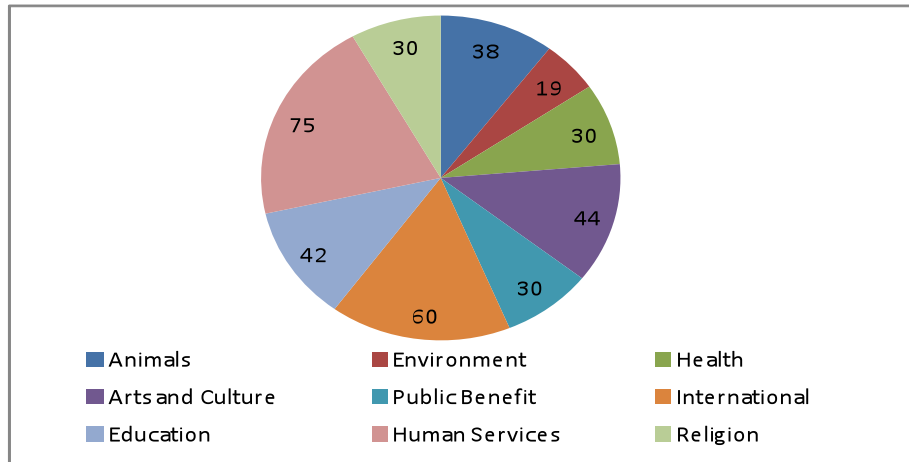
Data

The panel data used for this study was built from the data of Gordon, Knock and Neely from 2009. From the 5233 organizations listed on Charity Navigator in June of 2007 they selected a random sample of 525 organizations. After eliminating charities without usable data they evaluated 405 organizations and compiled information that stretched over a three-year period. Added to that data are additional years of ratings and net asset, eliminating organizations that had merged with others or lacked the additional data or, which for other reasons, no longer

exist on Charity Navigator. Over the five year period from 2000 to 2005, 16% of organizations that filed IRS Form 990s in the 2000 time period failed to file in 2005. This means that they either dropped below the \$25,000 filing threshold or went out of business (“NCCS | Data & research on the US Nonprofit Sector,” 2011) So, the drop in number of organizations is not unusual for industry. Ultimately, the data comprised 368 organizations. The 2009 data of Gordon et. al. was chosen for four reasons. First, Charity Navigator is the largest rating agency, with over 5500 charities rated. Second, on the Charity Navigator website they claim to “serve over 3.3 million unique visitors and impact approximately \$10 billion of charitable donations each year.” Third, it is a free service and more accessible to the general public than organizations such as Charity Watch or Consumer Reports which charge a fee. Lastly, Dan Neely was kind enough to share his data which provided a random sample with almost half the specific data needed for this study and which was previously analyzed for donor behavior.

Charity Navigator identifies nine categories of charitable activity which are also widely used by other charity classification systems. The category system is outlined in Table 1. These categories are used in this paper to distinguish differences in measurement and behavior between different charities. A breakdown of the sample data by category is shown in Figure 1. Data was collected about the rating and net assets for each charity for the period of 2004-2009. Additionally the founding year of each institution was included, as age can be considered a proxy for reputation. Even with adjustments by Charity Navigator for industry differences there are differences between the means of ratings for different categories. As can be seen in Table 2, charities in the Arts and Culture category had the lowest average rating of 49.743 while the education category had the highest average rating of 56.066. The average rating for all charities was 52.906.

Figure 1: Distribution of the Sample Charities by Category



A one-way analysis of variance for rating across the industries found that there was a significant difference in the means between categories. Different industries naturally have differing levels of financial efficiency. This might weaken the value of ratings as a method to compare charities in different categories.

Table 1: Categories of Charitable Activity

Category	Type of Causes
Animals	Animal Rights, Welfare, and Services Wildlife Conservation Zoos and Aquariums
Arts, Culture, Humanities	Libraries, Historical Societies and Landmark Preservation Museums Performing Arts Public Broadcasting and Media
Education	Universities, Graduate Schools, and Technological Institutes Private Elementary and Secondary Schools Other Education Programs and Services Private Liberal Arts Colleges
Environment	Environmental Protection and Conservation Botanical Gardens, Parks, and Nature Centers
Health	Diseases, Disorders, and Disciplines Treatment and Prevention Services Medical Research
Human Services	Children's and Family Services

	Youth Development, Shelter, and Crisis Services Food Banks, Food Pantries, and Food Distribution Multipurpose Human Service Organizations Homeless Services Social Services
International	Development and Relief Services International Peace, Security, and Affairs Humanitarian Relief Supplies Single Country Support Organizations
Public Benefit	Advocacy and Civil Rights Fundraising Organizations Research and Public Policy Institutions Community Foundations Community and Housing Development
Religion	Religious Activities Religious Media and Broadcasting
	Data from www.charitynavigator.com

Table 2: Means and Standard Deviations of Data used in the Model by Industry

	Observatio	Rating		Age		Net Assets \$1000	
		Mean	Standard Deviation	Mean	Standard Deviation	Mean	Standard Deviation
All Charities	2179	52.906	10.499	52.078	40.288	117000	604000
Animals	225	53.873	9.821	59.058	35.060	19800	50600
Environment	111	54.966	8.989	44.405	31.286	260000	980000
Health	177	57.085	11.027	29.791	17.773	21900	46100
Arts and Culture	262	49.743	9.702	66.828	41.593	68200	92700
Public Benefit	179	51.733	9.714	34.246	19.316	9833	10500
International	356	51.375	11.682	40.371	25.045	52800	135000
Education	249	56.066	8.203	84.153	59.776	640000	1490000
Human Services	445	52.650	10.775	59.658	41.715	42100	326000
Religion	175	51.336	10.646	25.571	11.811	7781	21000

Highest vs. Lowest Ranked Charities

In order to examine differences between the behavior of the highest and lowest ranked charities the data was divided by year into quintiles. A summary of the data divided by quintile is displayed in Table 3. Just by a cursory inspection of the data there appears to be a positive correlation between the net assets and the rating of a company. The top quintile of rated companies has average net assets of \$335 million. The lowest ranked charities have net assets of only \$16.6 million. This correlates with the theory that larger charities have economies of scale that allow them to operate more efficiently than smaller organizations.

Table 3: Means and Standard Deviations of Data used in the Model by Ratings Quintile

		Rating		Age		Net Assets \$1000	
		Mean	Standard Deviation	Mean	Standard Deviation	Mean	Standard Deviation
All Charities	2179	52.906	10.499	52.078	40.288	117000	604000
I	436	37.179	7.855	46.135	33.900	16800	39900
II	436	48.307	2.568	53.007	40.013	39700	116000
III	436	54.342	2.411	56.667	42.181	76100	307000
IV	436	59.748	1.963	56.075	42.704	122000	528000
V	435	65.188	2.249	48.472	41.152	335000	1180000

An interesting and illuminating method to examine the differences between highly rated and lower rated charities was to compute the charity rating changes for the entire sample and then isolate the top and bottom quintiles and look at differences between the two. The mobility of charities in their ratings is presented in Table 4, the matrix of transitions over the period of 2004-2009.

**Table 4: Charity Rating Mobility
Quintile Transition Matrix, 2004-2009**

	I	II	III	IV	V
I	57	25	11	4	2
II	24	31	23	15	7
III	11	24	30	21	14
IV	4	15	22	35	24
V	3	5	13	25	53

Over all of the year to year changes in ratings about half of both the highest and lowest charities remained in the same quintile. This is lower mobility than the 60% of charities in between. The largest share of any quintile remained in the same relative ranking quintile each year. The mobility from either the top quintile V to quintile I or I to V was extremely low, less than 3%. One would expect that highly rated charities would act to maintain their rating and show less mobility than the lowest rated charities that have an incentive to improve their rating and move to a higher rating. In Figure 2, the difference between the highest and lowest rated charities is displayed more clearly. While both groups follow the same trends year to year, the lowest rated charities are consistently more likely to stay low rated than the highly rated charities are to remain highly rated. This is counter to expectation however not entirely inconsistent with the literature on donor responses to ratings. It is also interesting to examine the behavior of those charities in quintile III which displays a distribution wherein about one-third remain the same, one-third raise their ratings and one-third have their rating lowered. This implies that the rating change from one period to another is not systematic in an increase..

If the mechanism for inducing a behavioral change is through a change in public support, and the level of public support over time is not significantly motivated by ratings then the results shown are reasonable. Charities tout their ratings on their websites, however charities might believe that goodwill and reputation in the community are more important than online ratings. Ratings whether good or bad would then be disregarded.

**Figure 2: Mobility of the Highest and Lowest Rated Charities,
Likelihood of Remaining in the Same Quintile Ranking**

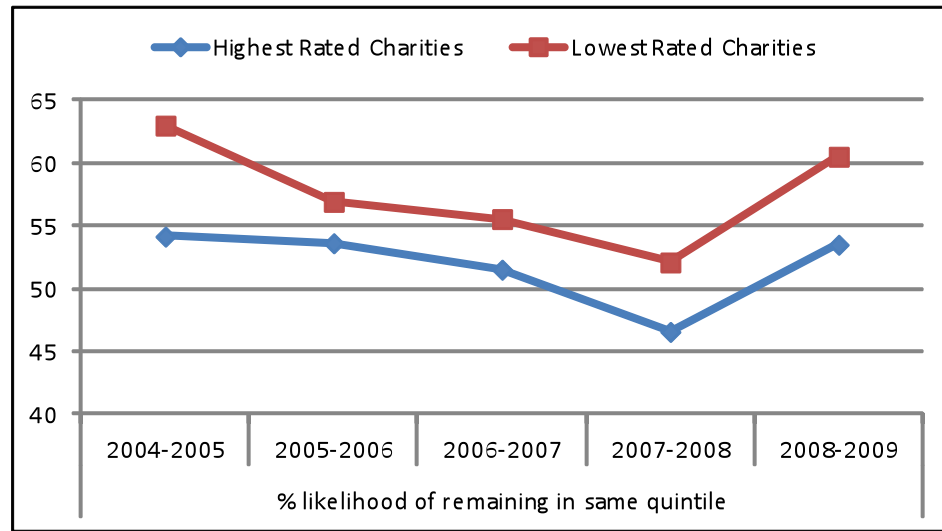
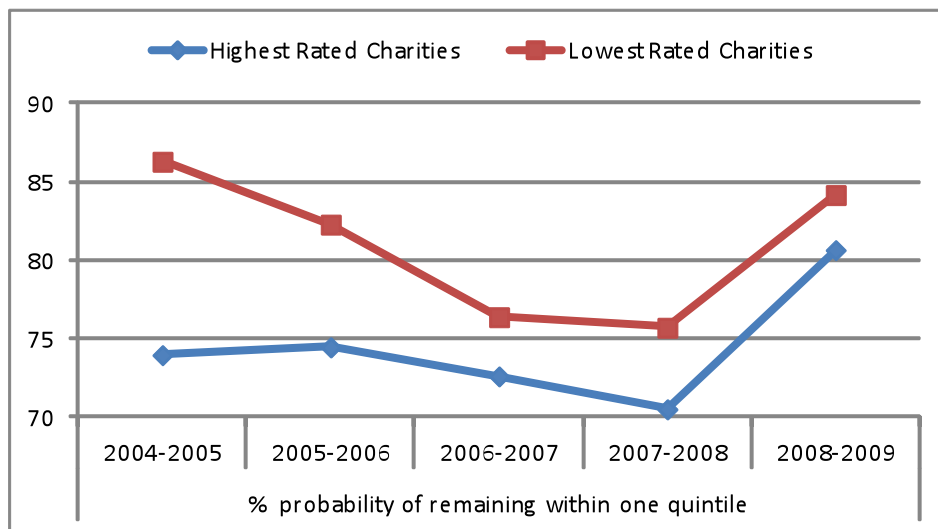


Figure 3 shows the trends for both the highest and lowest rated charities for staying within one quintile on a year to year basis. In this analysis, the lowest rated charities have a 75 to 85% of staying in the bottom 40% of charities from year to year. There doesn't seem to be a significant movement toward improvement. The transition matrix shown in Table 4 shows that

**Figure 3: Mobility of the Highest and Lowest Rated Charities
Likelihood of Remaining within One Quintile Ranking**



50% of the lowest ranked charities remain in the lowest quintile year after year. Charity ratings don't seem to have a significant effect on the behavior of the low rated charities. While there is slightly more mobility for the higher rated charities, they also do not seem to strive to keep their ratings high to the extent that would be expected. If there is a pattern whereby lower ratings leading to lower donations and lower donations leading to worse financial measurements, then there may be a cycle in which a charity cannot break out of the lowest quintile.

Given the assumptions above about the behavior of a charity a model has been developed for measuring whether a charity's rating impacts their behavior future ratings. A charity's rating in period t is dependent on its rating in $t-1$, if this is significant for charities of both low and high levels then managers are failing to change their behavior in regard to financial management in response to lower ratings. Age was included as a proxy for reputation. The log of net assets was included in order to include a measure of changes in the size of a charity. Regressions were performed with a lag time of one year, similar to the donation model of Gordon et.al.:

$$\text{RATING}_t = \beta_0 + \beta_1 \text{RATING}_{t-1} + \beta_2 \text{LN_NET_ASSET}_{t-1} + \beta_3 \text{AGE}_t + \varepsilon$$

Because the ratings are based on the IRS form 990 that is filed by each organization there is a lag time between the behavior of the organization and the rating received. The tax form is due 135 days after the end of the fiscal year but there is a 4 month extension available. Then there is a lag time before the data is available publicly for the ratings agency and more time before the agency can evaluate the data. Additionally, a charity might be budgeting ahead and unable to change spending allocations very quickly. With these considerations, a two year lag time does

not seem to be unreasonable between behavior and response. So, a similar regression model was used with a 2 year lag time:

$$\text{RATING}_t = \beta_0 + \beta_1 \text{RATING}_{t-2} + \beta_2 \text{LN_NET_ASSET}_{t-2} + \beta_3 \text{AGE}_t + \varepsilon$$

After running a Hausman test to determine whether to use random or fixed effects, all regressions were all run with panel data using fixed effects. The results of the regression analyses for all charities and the decomposition between the highest rated 20% of charities and the lowest rated 20% are presented in Table 5. The first three columns of results refer to the model with a 1 year lag time while the last three columns refer to the model with a two year lag. In both models there was a significant effect of a past rating on a future rating for all charities and for the highest rated 20%. However, for the lowest rated 20% of charities ratings were not a significant explanatory variable. If you examine the sign of the coefficients, they are positive for the shorter term, one year model but are negative for the longer term, two year model. It would appear that while there are differences between the charities of different ratings, they are not consistent in their behavior over time.

Table 5 Regression Results for Highest and Lowest Rated Charities

Independent Variable	1 Year Lag			2 Year Lag		
	All Charities	Highest Rated 20%	Lowest Rated 20%	All Charities	Highest Rated 20%	Lowest Rated 20%
Rating at t	.229***	.267*	0.318	-.111***	-.321**	-0.245
Log Net Assets	1.161*	1.645	0.065	0.030	-2.509	1.558
Age	0.021	0.527	-1.017*	-0.053	2.591***	-2.666***
Constant	21.636*	-16.935	88.916***	62.040***	-23.382	177.430***
N	1775	344	356	1420	275	284

Largest vs. Smallest Charities

The data was also sorted into quintiles based on the net assets each year so as to distinguish between the large, wealthier charities and the smaller charities. A regression was run all charities and for subgroups comprising largest 20% of charities and the smallest 20%. Results are presented in Table 6. The first three columns of results refer to the model with a one year lag time while the last three columns refer to the model with a two year lag. In both models there was a significant effect of a past rating on a future rating for all charities and for the smallest 20%. Similar to the results for the charities broken down by ratings, if you examine the sign of the coefficients, they are positive for the shorter term, one year model but are negative for the longer term, two year model. It would appear that while there are differences between the largest and smallest charities, they are not consistent in their behavior over time.

Table 6: Regression Results for Largest and Smallest Charities

	1 Year Lag			2 Year Lag		
	All Charities	Largest 20%	Smallest 20%	All Charities	Largest 20%	Smallest 20%
Rating at t	.229***	.146*	.267***	-.111***	-0.138	-.235**
Log Net Assets	1.161*	0.123	2.064	0.030	1.859	-3.468
Age	0.021	0.000	0.241	-0.053	0.069	0.165
Constant	21.636*	45.736	3.034	62.040***	31.977	120.506*
N	1775	361	329	1420	266	288

Another expectation of this analysis was that there would be variation between charities which have different missions. A regression was run of the model with a one year lag and the results are presented in Table 7. These results show a difference between the categories with

environmental charities appearing to have no relationship between ratings in consecutive periods.

In the one year lagged model regressed for Table 7, there are consistent positive results for all the other categories although there are differences in the other explanatory variables.

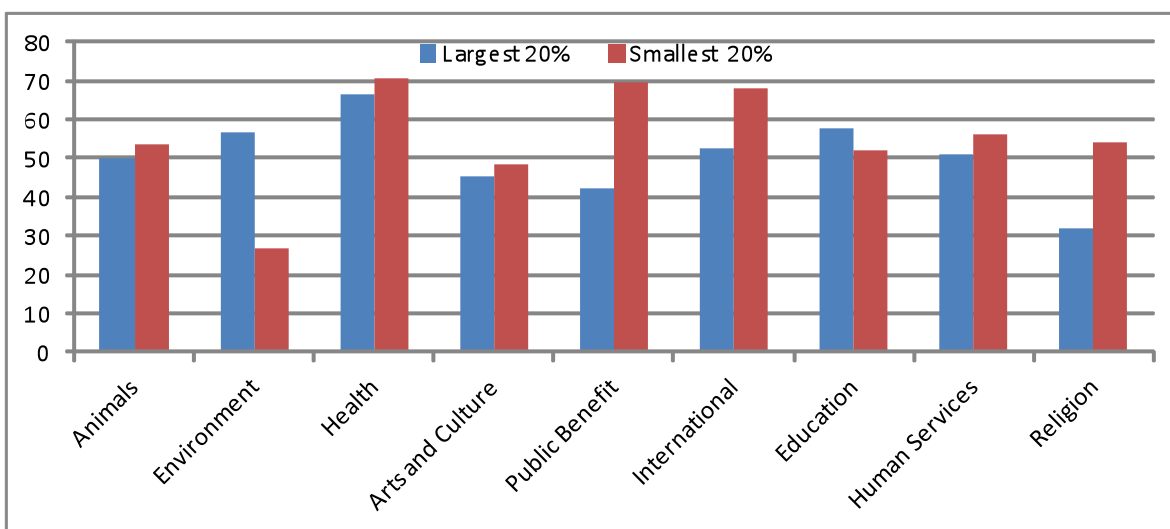
Table 7: Regression Results by Category

	All Charities	Animals	Environment	Health	Arts and Culture	Public Benefits	International	Education	Human Services	Religion
Rating at t-1	0.229*** 0.027	.212**	-0.012	.246*	.233**	.319***	.256***	.356***	.234***	.214*
Log Net Assets	1.161* 0.497	3.146	-1.520	1.118	-2.124	4.013***	0.553	-5.938*	1.727	1.388
Age	0.021 0.123	0.056	0.311	-1.209**	0.413	-0.012	-0.027	0.638	0.255	-0.200
Intercept	21.636* 8.604	-9.145	66.853	61.877**	47.450	-26.239	31.526	89.436**	-1.643	26.440
R-squared	0.390	.140	.09	.312	.034	.121	.478	.171	.036	.130
F-statistic	30.930	4.06	.01	5.18	3.01	11.13	6.01	11.19	7.78	1.91
N	1775	183	92	145	217	142	289	207	363	137

Another aspect of the variations between categories of charities can be shown if you look at the smallest and largest charities by category and compare the mobility between them. This data is represented in Figure 4, with the exact data in Appendix B. Some categories, such as animals and health have little difference between the smallest and largest charities at approximately 50% and 68% respectively remaining in the same quintile of ratings year to year. In the environment category, the larger charities are significantly less mobile with over 50% remaining stable, while the smaller charities only stay in the same quintile 27% of the time. Public benefit and religious

charities reverse that with the smaller charities much less mobile. There must be unique qualities that are not captured in this data that lead to the differences between categories.

Figure 4: Mobility of the Largest and Smallest Charities ranked by Net Assets, Likelihood of Remaining in the Same Quintile Ranking



The results suggest that although there are some differences in charity behaviors between different industries, between the poor and rich charities and between the large and small charities, there is not a consistent pattern of charity behavior in response to changes in ratings. If one reason for charity ratings agencies to exist is to serve as watchdogs, to patrol and ensure that charities are spending donations efficiently, then perhaps they are not doing their job as intended. In theory, there are positive aspects to using information based regulation in the form of charity rating agencies, as tax returns are already required and there is an enforcement mechanism built in to the structure for donors and stakeholders who would care about such ratings. In practice, however, there doesn't seem to be an incentive for charities to change their ways, if such a thing is either possible or beneficial.

As early as 1966 Tullock was calling for transparency of information about nonprofits and a labeling law for their outcomes. Now that there is greater accountability in financial measures there still doesn't appear to be an incentive for inefficient charities to clean up their acts. There are multiple possible explanations for these results. One possibility is that charities believe that charity ratings don't affect them either negatively or positively. This could occur because only a small portion of donors consult charity ratings to guide their allocation of funds, alternatively, they could consult the ratings but choose to be indifferent to the advice, relying instead on personal knowledge and experience. Perhaps the failure of the ratings agencies is that they evaluate available numerical information but not outcomes. Low rated charities may still yield good outcomes while there is no guarantee that highly rated charities produce superior results for their beneficiaries. It is even possible that nonprofits can modify their behavior to increase ratings without positively impacting the qualities that the ratings are supposed to measure.

Concluding Remarks

This paper examines the effect of charity ratings on the behavior of the nonprofits. There is little evidence that ratings impact the financial management of nonprofits in a consistent, meaningful way. Regardless of the reasons for the lack of action on the part of charities, there seems to be evidence that charity ratings are not yet a driver for nonprofit firms to improve according to the measures employed. It has been suggested that a better system for measurement is needed. One possible framework employs four factors, current spending, program spending, program output index and program quality index, which are combined multiplicatively to create a standardized unit of output divided by total revenue in a period (Tinkelman & Donabedian, 2007). Leaders of nonprofits define effectiveness as impact evaluation but less than 10% of

nonprofits attempt to measure the impact of their services (Heiberg, 2009) If internal managers that are intimately familiar with the unique characteristics of a charity are not evaluating the effectiveness then is it possible for an outside rating agency to do so.

Charity ratings agencies may lack a business model that would incentivize them to invest in the type of research needed to quantify outcome or even to identify qualitative standards of best practices. Charity Navigator modified its rating methodology in 2011 to include measures of organizational impact, financial health, accountability and transparency, and outcome to a certain extent. In a review of recent updates on the Charity Navigator site, it appears that approximately 10% of the rated nonprofits resubmitted updated information for the 2010 fiscal year in order to have their rating updated. This does imply that some charities do care about their rating.

There is a path for further exploration of the topic in the deconstruction of the data to identify under what specific conditions a charity does change their behavior in the face of low ratings. In light of the Charity Navigator rating change in 2011 to add a measure of accountability a study of the 2010 and later data may shed light on the subject. In addition, if the low usage of rating sites is the issue, will there be a tipping point in the number of donors using ratings that will force the charities to improve? The findings of this paper provide insight in to the behavior of nonprofit firms and question the role of charity ratings agencies.

Appendix A

Methodology of Charity Navigator Ratings

Charity Navigator evaluates organizations granted tax-exempt status under section 501(c) (3) of the Internal Revenue Code and that file a Form 990. 501(c) (3) organizations are considered public charities and all donations to them are tax-exempt. Charity Navigator provides ratings for what are considered donative nonprofits, organizations which receive a substantial part of their income from donations from corporations and individual donors, this is in contrast to those organizations that receive most of their income from the sales of goods and services. Charity Navigator is the largest of the ratings agencies. They currently rate over 5500 charities and add more regularly. They exclude charities that report \$0 in fundraising expenses, as they are only interested in charities that actively solicit donations from the public.

More detailed information can be found on www.charitynavigator.com But the general principles are outlined below. As can be seen in Table 1, as of January 2011 Charity Navigator rated organizations on two broad measures, organizational efficiency and organizational capacity. Each has multiple performance categories which combines provide seven measures of performance. Each performance measure is scaled to a score of 0-10 and then aggregated to provide an overall rating of 0-70. This overall rating scaled to a 4 star system to simplify the ratings. Ratings >60 receive 4 stars while a rating <25 receives 0 stars. More than 66% of charities listed on website in 2009 received 4 stars (Heiberg, 2009).

Table 1: Charity Navigator Rating Criteria

Performance Category	Definition	Adjustments
Organizational Efficiency		
Program Expenses	program expenses divided by total functional expense	Program Expenses less than 33.3% receive 0 when a charity runs a combined deficit over time, the efficiency score is adjusted downward

Administrative Expenses	compare admin expense to total functional expense	Adjusted for category norms (i.e. in-kind donations)
Fundraising Expenses	compare fundraising expense to overall spending	Adjusted for public broadcasting and media
Fundraising Efficiency	determined by calculating how much charity spends to generate \$1 in donations	Adjusted for category norms
Organizational Capacity		
Primary Revenue Growth	increasing contributions from corporations, foundations, individuals, govt grants, program service revenue, contracts and fees and membership dues and fees over 3-5 fiscal years	Normalized for general economic conditions
Program Expenses Growth	growing programs and services	Normalized for general economic conditions
Working Capital Ratio	reserves of liquid assets: includes cash, savings, accounts receivable which determine how long a charity could sustain current services without raising any new revenue – organization with \$250 million or more in working capital automatically receive full points	adjusted that any organization with \$250 million or more in working capital receives full points
Data from www.charitynavigator.com		

Appendix B

Category	Largest 20%	Smallest 20%
Animals	50	53.33
Environment	56.52	26.67
Health	66.47	70.59
Arts and Culture	45.45	48.21
Public Benefit	42.31	69.7
International	52.63	67.95
Education	57.69	51.85
Human Services	50.88	56.34
Religion	32	54.29

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