Research on Psychological Effect of Compensation and Welfare Incentive from Behavioral Economics Perspective

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Abstract: Based on the research of scholars at home and abroad, a perfect and mature behavioral economics theory, incentive theory more is becoming a hot spot of research contents, and behavioral economics in salary, welfare incentive personalized reaction and the effect of regulation also made new progress, the elements of this paper in behavioral economics and the related model, based on cognitive psychology, experimental economics, institutional economics, etc., can from the point of view of man’s mental perception, to discuss the cause of incentive, so as to guide the salary welfare system setting direction, makes the incentive utility maximization.

Keywords: Behavioral economics, Compensation, Welfare incentives, Psychological effects.

1. Introduction

As the core of research for a long time, compensation and welfare incentive issue occupies an important position in the field of human resources. There are numerous relevant research literatures at home and abroad, and behavioral economics has gradually become a hot topic of research at this stage. With the development of society, the personalized needs of people are getting more and more attention. When the incentive problem in the early stage is fused with the theoretical perspective of behavioral economics, a new research direction will emerge. The elements and models of behavioral economics can provide theoretical explanation and support for the incentive problem of compensation and welfare. Therefore, based on this perspective, relevant scholars also start new research. Pay incentives and behavioral economics two areas as the research hot respectively, and the combination of the two areas at the present stage also constantly trying, innovative and research, based on the breadth, depth of different research perspectives and research, the research direction is differ, seize the trend of research in this paper, from the perspective of behavioral economics theory, starting from the individual differences, Based on the combination of management and economics perspective, to investigate the cognition of employees’ minds, so as to study the psychological cause of salary, welfare incentive and psychological effects, and provide guidance to incentive system, is based on the basis of previous scholars will be a combination of research, and from a new research field of vision, from the perspective of the employees’ mind to find the motivation and innovative.

1.1 Purpose

In this paper, with the theory of behavioral economics based on the enterprise employees’ psychological research, and then clear incentive, provide a reference for the establishment of enterprise incentive system, for salary welfare system set to provide the perfect and development of the theory support, and to fill some of the vacancy, such as the interpretation of the incentive of the abnormal phenomenon, enables the enterprise to save cost, at the same time enhance incentive effect, And then improve enterprise efficiency. In this paper, the research and analysis, compare in the Labor market, considering all kinds of psychological factors, further improve the mental research of labor, thus reasonable scientific coordination of labor distribution, full use of labor resources, at the same time makes the labor resources belongs and makes the harmonious development of labor market equilibrium, enterprise fully to obtain and use of labor resources, Promote social and economic development, alleviate employment pressure, recruitment difficulties and other social and economic problems.

1.2 Significance

Firstly, the incentive of compensation and welfare incentive is explained based on people’s psychological cognitive factors: compensation and welfare incentive is universal, but why does it exist? And why do incentives that go in the right direction sometimes go in the wrong direction? The essence is that people are all social people, so individual differences and incentive differences are common. Incentive acts on people, so it is explored from the perspective of people’s psychology, and behavioral economics is introduced to analyze economic and salary phenomena based on behavior, so as to make incentives clearer. Second, set the direction of the guide salary welfare system: the root of the clear incentives can suit the remedy to the case, to modify the original system vulnerabilities, set new system, using the results of the psychological inquiry, select salary system, skills, ability system, choose long-term performance plan or short-term performance plan, set the welfare model, etc., provide the basis for the enterprise. Finally, to maximize the utility of both companies and individuals: Has specific system design and humanized care staff, will go beyond the traditional way, increase the incentive effect, at the same time, companies use some of the employees, such as the existence of mental accounts, under the premise of can in does not affect the incentive effect, saving the cost of enterprise, so employees can be obtained with the coordination of common development of the enterprise, enhance the utility of the dual space.

2. The Theoretical Analysis
2.1 Theoretical Analysis Model of Behavioral Economics

Based on traditional economics, behavioral economics gives more consideration to people’s behavior and psychological factors. Starting from individual differences and based on people’s mental perception, behavioral economics explores principles to reflect phenomena in economics or provide reasonable explanations for some abnormal phenomena[1]. Nobel laureates Kahneman and Tversky behavioral economics master puts forward prospect theory is made in the field of main ingredients, prospect theory proposes that people when facing the future risk, reflected in the present stage of and measures for selection is based on the comprehensive consideration of several factors of value, the factors including reference to rely on diminishing sensitivity, loss aversion[2], the theoretical bases of these elements are frame of reference theory, fairness and reciprocity theory, preference theory, time discounting, limited will theory and psychological account.

Reference dependence refers to the mental consciousness of the people, the actual situation the influence degree of human body is lower than the actual differences between reference point, as well as relative value of the individual value judgement is based on a reference point, the so-called lost and access to natural, that is, relative to the reference point[3], like physical reference point to explain affinity “exercise is relatively” truth. And people for the selection of reference frame and the reference point is based on the anchor, anchor, is individual when making judgment, for significant, has obvious characteristics of comparative elements, always will be more value, for the secondary factors are ignored[4], so when choosing reference points tend to be significantly more representative, and anchor according to different people in different period, It also creates a gap in the choice of reference points. The existence of anchoring psychology leads to the emergence of “mental account” and “mental interval”, that is, different individuals have different amounts of money in their mental accounts, and the same individual has different amounts of money in their mental accounts at different times and under different circumstances. The prospect theory uses the relative position between the reference point of uncertainty and the value point to determine the value function of decision makers’ personal feelings.

Explained in a fair and fair reciprocity theory from the utility function model reflects the individual interests in the face of the advantageous position, is to “get” state, will fade out of injustice, and at a disadvantage position, that is “lost”, will strengthen the sense of injustice[5], and to repay, friendly behavior in retaliation for hostile actions. Equity theory is a kind of preference theory, of course, people for a fair perception is based on their own preferences to set, and the preference theory itself in the selection process can be divided into elements and factors in the process of matching, and that there are not exist in isolation but the possibility of “from” and “rose”, namely the linkage.

If above theory are at a point in time, so time discounting, limited theory is based on the analysis of time, will show events more discount for the delay, that is to say delay spending will pay more compensation, relative to the original value while spending ahead of time will pay less relative to the original value of the loss of[6], as accounting accounts, For prepayments of accounts payable, there is an administrative fee, a “concession” for prepayments—the amount is discounted by a percentage, as opposed to an increase if payments are deferred. Therefore, the greater the value of interest is in the long term and the short term will be different. In such a value measurement process, people’s will is also limited, and delay-acceleration asymmetry is the normal state.

2.2 Explanation of Compensation and Welfare Incentive Theory

The incentive of compensation and benefits has always been the core research area in the field of human resource management. The incentive of employees directly affects the work efficiency of employees, and thus directly relates to the development performance of enterprises. Traditional theories have also made a lot of contributions in this aspect. Such as early demand level theory, X theory Y, inspiring a health theory, reinforcement theory, equity theory, expectancy theory, etc.[7], is based on the staff as “not completely rational man” assumption, and fully considering the economic interests of relevant factors on the effectiveness of employee motivation, more in line with the actual circumstances of the enterprise staff, The essence of these theories is based on the study of individual differences, placing individuals in the social network from the perspective of human cognition and perception. Thus, behavioral economics theory and incentive theory to compensation at this stage, from individual mental perception of individual differences research, and then from the Angle of the effect of psychological motivation related incentive, this article is precisely the combination, compensation, employee welfare, rigid salary (work) on an ongoing basis, performance pay, etc. A new perspective to view and explain the problem.

3. The Research Content

3.1 Comparison of the Theory of Reference, the Theory of Equity and Reciprocity and Salary Level.

3.1.1 Comparison of frame of reference theory and salary level

Actual situation in the frame of reference and reference level relative difference is more important than the absolute value of the actual situation of[3], this shows that the level of compensation set quite important external competition and internal fair, internal competition, the reference point for internal staff salary comparison, external fair reference point for the same industry compared to position compensation levels. Therefore, the comparison of these two reference points should be fully considered when determining compensation[8-9].
As shown in figure, external competition level of wages, for example, an external salary level, when external reference point for a1, X and Y on the same indifference curve, at this point, the internal employee salary in the X and Y in satisfaction indifference, as the reference point from a1 to a2 or a5, relative to the Y, people prefer to X, satisfaction of X at a higher salary. Similarly, when the reference point changes from A1 to A3 or A4, people tend to prefer Y over X, and satisfaction is higher at Y.

As a result, the company’s compensation system should be placed in the social network, run in the frame of reference, for enterprise monopoly or oligarchs, their reference point is less, but the majority of enterprises under the condition of market economy in the environment of fair competition, based on this, they are in the labor market of human resources for natural and fair competition. The selection of external reference points also becomes the key to the success or failure of the competition. First, there are many reference points. Based on the anchoring psychology of people, the characteristics of the selected reference points must be the same with the nature of the company, such as the same industry and field, so as to be comparable, effective reference points, and accurate reference results. Secondly, for the option of using should focus on horizontal and vertical, since the choice is the same with the company the nature of the reference point, with the novelty and then use the key is to find out the company, the characteristics of differentiation competitive strategy, thus for the particular suit and match the company’s labor resources, so set of salary system. For the external market, it is not blind. Different from the competition of interests, the competition between interests is to obtain the maximum and best benefits, and the purpose is to reap the maximum benefits. To enhance the external competition of labor force is not to successfully recruit high-quality labor force, but to recruit suitable people for the company at a lower cost. Moreover, based on this system, it can retain workers for a long time. Internal reference effects by the same token, the external market only the small concentration into the company’s internal environment, the internal reference more will generate a sense of fairness, is the so-called people don’t and billionaires than injustice, will be the same as the side conditions characteristics with their own people than uneven, and further, this kind of injustice in lose and gain, there is a big gap between If it’s the other person, it’s significantly less unfair than if the other person is superior to you.

3.1.2 Fairness and reciprocity theory and salary level comparison

In their model of fairness and self-interest, Fehr and Schmidt conclude: People’s lost value perception is usually twice the number the same[5], as shown in figure, in the region of the salary, when changes from wages from the X1 x2, corresponding employee value perception changes from Y1 to Y2, in pay zones, when it changes from wages from the X3 to x4, corresponding employee value perception from Y3 changes to Y4. Cut regional function image than raise the function of image more steep, obviously, the gap between Y1 and Y2 is less than the gap with Y3 Y4, the same amount of salary change, people to pay the value perception than to raise the value of perception, so people for the same happiness increase awareness is far less than for the same pain increased awareness.

As shown in the figure, at point X (X1, X2), X1=X2, X1 on the left of X X2, and the slope of the right line is greater than that on the left. Employees’ sense of injustice when their salary is at a disadvantage is much higher than that when their salary is at an advantage. So workers will be decided according to the gap between real wages and a fair wage their own effective labor input, if the real wage is less than a fair wage, then workers will only pay with corresponding effective labor, real wages injustice makes laborer slacking.
and play a critical role in the final decision is a belief in the action rather than the actual action, So make your employees feel fair, even if it does exist. This problem is also reflected in the fair wage-effort hypothesis[10]:

\[ E = \min(W \times W1, 1), \]

\[ E \]

represents effective labor input, \( W \) represents actual wage, and \( W1 \) represents the subjective fair wage that workers believe they deserve. According to the analysis of this equation, workers will choose matching effective labor input based on the comparison between actual wage and fair wage that supervisors perceive they deserve.

Therefore, in combination, employees with advantages will pay more effective labor input than the actual wage, while employees with disadvantages will pay less labor input than the actual wage, and even undermine the effective labor of other employees. Based on this, there should be two enlightening thoughts in the design of salary system: First of all, the advantages and disadvantages of complement each other always contradictions of two opposites, there can be no way to make everyone an edge, so that employees in focus, which is the advantage of their effective labor input will maximize the impact on the enterprise, alleged 28 principle is also in the same way, giving 80% to 20% of the key personnel, to create the biggest returns. Therefore, an open and transparent assessment system is the key. Fair competition among employees can be regarded as the least cost way to achieve results. Secondly, for the disadvantaged employees, their effective input is less, and more importantly, there is a risk of destroying the labor input of other employees. If not managed, the imbalance of the balance may result in the loss of both sides. Therefore, how to supplement or minimize their sense of injustice in other ways? One of the most feasible ways is to give them the opportunity to step out of the established circle and attribute the existence of inequity to the individual rather than the enterprise, as long as their efforts and results are up to the standard.

### 3.2 Preference Theory and Employee Welfare Design

#### 3.2.1 The role of preference in selection-matching

Personal always exist all sorts of preferences, so how to make use of and impact these preferences will become the key for motivation, for the company’s benefits plan, it can be from passive to active pair do employees, give employees the selection and matching of space, because the process of choice is actually choose the main contradiction in a certain field, which has decisive influence the choice of the process,

Selectors mainly consider only one or a few main aspects, and matching process is policymakers must comprehensive measure of several aspects, and to a certain weighted transformation, provides the basic matching between various aspects, this process needs to quantify the transformation, provides the basic matching between various aspects, this process needs to quantify the transformation, and results are up to the standard.

As shown in the table in the welfare of the two forms and cash for physical welfare benefits, and assume that people are more inclined to cash benefits, in kind or cash as the main factors, and for the secondary factors, under the “choice” scheme, according to the assumptions, \( B \) is greater than \( A \), under the “matching” program, even if people prefer cash, but because of the matching element, therefore, Must need to consider the physical effects, thus, cash weight decreased physical weight increase, namely \( D \) is less than \( B \), \( C \) is greater than \( A \), changed the way the welfare is also changing the proportion of the original welfare, which resulted in the reduction weighting of the main factors of and weights rise of secondary factors, make full use of this principle, will choose to the welfare of the directional dynamic elastic matching, and then control the enterprise cost. In addition, during the matching process, employees can give full play to their subjective initiative, so employees’ satisfaction will not be reduced, but their sense of participation will be enhanced.

### 3.2.2 The impact of choice relevance on employee preference

In the process of welfare scheme selection, employee’s current choice is affected by the correlation at the same time to choose, so that eventually even reverse biased preference, based on this, you can set the benefit correlation plan to affect employee preferences, such as cash and travel abroad, employees choose probability is 50%, if increase the scheme set a domestic tourism, Therefore, the probability of traveling abroad is likely to increase. Therefore, the design of flexible welfare program can not only reduce the welfare cost of the company, but also cannot reduce the incentive degree of employees.

As shown in figure 4, for benefits plan X and Y, employee value perception gap for | \( X1 \), \( Y1 \) |, let employees in the first scheme to choose between A and B, then the value of perception as the B1 | | A1 | because B1 | | A1 > | X1, Y1 |, so employees will tend to choose lower levels of X, but instead let employees first lies in the choice of scheme between C and D, So the value of perception for | \( C1 - D1 \) |, because | \( C1 - D1 \) | < | \( X1, Y1 \) |, so employees tend to choose high level of Y., in addition, the following table 2 | \( X1, Y1 \) | = 7500550-5000 = 500, so every proportion sunk costs 15 units corresponding

### Table 1: Benefit selection or match analysis table

<table>
<thead>
<tr>
<th>Welfare</th>
<th>Physical</th>
<th>Cash</th>
</tr>
</thead>
<tbody>
<tr>
<td>Optioning scheme</td>
<td>A</td>
<td>B</td>
</tr>
</tbody>
</table>

**Figure 4: Select correlation comparison diagram**

As shown in figure 4, for benefits plan X and Y, employee value perception gap for | \( X1, Y1 \) |, let employees in the first scheme to choose between A and B, then the value of perception as the B1 | | A1 | because B1 | | A1 > | X1, Y1 |, so employees will tend to choose lower levels of X, but instead let employees first lies in the choice of scheme between C and D, So the value of perception for | \( C1 - D1 \) |, because | \( C1 - D1 \) | < | \( X1, Y1 \) |, so employees tend to choose high level of Y., in addition, the following table 2 | \( X1, Y1 \) | = 7500550-5000 = 500, so every proportion sunk costs 15 units corresponding
welfare: B1 | = | A1-10000850-8000 = 500, each proportion sunk costs 20 units corresponding welfare;| C1 - D1 | = 5000250-2000 = 500. The proportion of each corresponding welfare sunk costs 10 units, so employees tend to choose 1 X, and the employee 2 more inclined to choose Y.

Therefore, the contrast scheme of welfare design may overturn the original choice. How to make use of this in welfare design is an art, of course, the key is to grasp the psychological account in the gap of interest contrast, the right medicine.

### Table 2: Select the correlation comparison table

<table>
<thead>
<tr>
<th>Plan</th>
<th>Sunk costs</th>
<th>Choose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Welfare</td>
<td></td>
<td>Employee 1</td>
</tr>
<tr>
<td>A1:65000</td>
<td>8500</td>
<td>Unknown reference selection</td>
</tr>
<tr>
<td>B1:55000</td>
<td>8000</td>
<td>Unknown reference selection</td>
</tr>
<tr>
<td>C1:30000</td>
<td>2500</td>
<td>Non-participation in selection</td>
</tr>
<tr>
<td>D1:25000</td>
<td>2000</td>
<td>Non-participation in selection</td>
</tr>
<tr>
<td>Welfare</td>
<td></td>
<td>Employee 1</td>
</tr>
<tr>
<td>X1:37500</td>
<td>5000</td>
<td>A high percentage were selected</td>
</tr>
<tr>
<td>Y1:45000</td>
<td>5500</td>
<td>A high percentage were selected</td>
</tr>
</tbody>
</table>

#### 3.3 Compensation Setting

Prospect theory pointed out for the interests of the absolute value of the established total exist, people pay more attention to the change of the interest value, and benefits change value and relative value of absolute value between the original contrast, more people to pay close attention to the core of instinct, therefore, compared with the amount of wages, people pay more attention to the increase and reduction of salary[2]. So fixed and variable pay wages has its existence is necessary, both the position and length of service compensation system of relatively fixed wage setting, and the change of performance pay system design, increase the wages of the elastic, in addition, for wage flexibility, the direction and degree of changes has great influence on employees’ enthusiasm, because people in the face of the “reduce”, namely the losses for risk appetite. They tend to gambling, such as the stock has been losing money, people don’t sell, instead, on the other hand, has been profitable stock, people are more and more uneasy, always look for opportunities to sell go out, because the people in the face of the earnings prospects are more inclined to achieve certainty, tend to be vested interests, fear of loss of vested interests, manifest the psychology of risk aversion, Therefore pay normal changes are shown by the efficiency wages, higher than that of vested, appropriate up unfavorable, with a lower amount of salary and increase, bring the feeling of individual right, etc., the former is better than the latter, so rigid wages, workers pay less for the future than the current wage increases reflect the strong reaction, unless there is a drop the justification for wages. For example, if there is a problem in an employee’s work or a bottleneck in the current stage of enterprise development, the reduction of salary may have little impact on the premise of sufficient explanation and confirmation of facts and recognition by employees.

Rigid salary also can only say motivation hygiene factors in health care factors, also won’t let a good employee satisfaction, and processing is bad will let employees are not satisfied, and the elastic compensation Settings such as performance-related pay can have health care function, employee satisfaction, based on this, this paper starting point is to study the effect of time discount, limited will, from the short and long-term consideration of time, Because the change of wages is always based on the development of time, the amount of change in the individual’s psychology, is always associated with time.

Phelps and Pollak once proposed the time discounting model, which is modified in this paper: Ut (Ut, ut+(1t)...And u (t+n)) = aut + bu (t + 1) +...+bu(t+n), (where a is the standard discount rate of 1, b is people’s preference, take B =1/2 indicates a preference for near-term interests.)

Assume that employees currently have a choice of two benefit plans: In half a year, the employee will get 5000 yuan, and the utility hypothesis is U1 =4 and U2 =0. In one year, the employee will get 8000 yuan, and the utility hypothesis is U1 =0 and U2 =6. Therefore, at period 1, the utility of plan 1 is greater than that of Plan 2. The utility of welfare plan 1 is: U1 (U1, U2) = U1 +(1/2) U2 =4+(1/2)*4=6 The utility of welfare plan 2 is:U1 (U1, U2) = U1 +(1/2) U2 =0+(1/2)*6=3 At period 2, the utility of plan 2 is much higher than that of Plan 1. In the long run, the employee will choose the welfare with the market value of 8000 and give up the welfare with the market value of 5000. The utility of welfare plan 1 is: U2 (U2) = U2 =6. The utility of welfare Plan 2 is: U2 (U2) = U2 =6. As you can see, in the short term (1), the staff will be eager to choose in the near future benefits, even if its in a secondary position (that is, the amount is less), but people have no patience, when choosing a secondary solution utility for employees more, but in the long run (2), the employee must give up secondary solution, higher solution more sensible choice of welfare. At this point, high benefits bring maximum utility, and low benefits are not attractive to employees.

Therefore, incentives need to be timely, such as the way of exchanging welfare coupon points. As the future progresses, the more benefits are exchanged, and the future progresses, the less benefits are exchanged. Therefore, short-term incentives, such as performance-based salary increase, one-time bonus, monthly/quarterly floating salary, and special performance recognition, can be realized in time, with good incentive effect and low cost., on the other hand, in a long period, the adjacent two months is indiscriminate for individuals, but in the short term, policymakers will be pay attention to the difference, so the long-term incentives such as employee stock ownership plan, stock option plan, enterprise pension, etc., will be longer, to current effect is small, can retain employees for a long time. And when people have money income expectations but have not yet received, can be rational to arrange and plan the uncollected accounts, but if you really received money, tend to immediate cost, so through some of the long-term incentive system, employees can also be saving money in the enterprise for business investment, so that employees can reasonable planning, enterprise also to obtain financial support. However, people in different life cycles have different wage-risk tradeoffs. At this time, employees will weigh long-term and short-term income.
Therefore, the same salary has different incentives for employees of different age groups.

3.4 Interpretation of Abnormal Incentives by Psychological Accounts

So-called perverse incentive, is added to the problems of incentive, which is beyond the “rational man”, regard people as “social person” to the best explanation, from a rational point of view, based on common sense, or in the elimination of culture, the family under the influence of emotional factors, such as the interests of the people for choosing nature is inclined to take big house is small, it is true, so why does post-mortem analysis appear to take smaller than larger? In fact lies in a “big” and “small”, in the accounting account size is only simple Numbers, and are not in the mental accounts, such as with a policy of mental accounts explain company bonuses, dividends will be distributed to employees not to invest again, people on the account will be in accordance with its own budget to restrain their own spending behavior. But getting a bonus is like a bonus that can be spent directly without affecting your budget if you don’t spending by investment, may eventually pay a higher total, but individuals feel less than the actual profit, instead of incentive effect, happiness feeling is reduced, thus high compensation does not necessarily happy, low is not pain, mainly on account of comparing and cognitive, the cognitive deviation will cause the incentive effect of abnormality.

4. Conclusion and Discussion

In this paper is focused on the psychological effects of salary, welfare incentive analysis, and analysis is based on behavioral economics theory, based on the person’s psychology behavior, such as the reference point, behavior preference, mental accounts, etc., for the phenomena and problems in the process of the preexisting incentive, with this new perspective to explain, in the original research into another vision, innovative. And research purpose is to practice guidance, through the analysis we can see that actually provides reference for enterprise system changes and make the basis, in the original system, for example, using the staff’s psychological effect, adopt new ways, and thus in employee satisfaction and benefits on the basis of the incentive effect is the same or even increase, minimize enterprise labor costs. Employees psychological utility maximization enterprise performance utility maximum at the same time, so this article research has practical significance, but also has some problems, such as the text of the assumptions to be further discussed, whether there is a variety of situations, if you remove assumptions, and through the empirical analysis in this paper, can’t use data to prove the conclusion. Purely descriptive research lacks objectivity and persuasiveness of data analysis. So since confirmed the feasibility of this inquiry and research value, and there is a lack of empirical research, future studies in this field was also exist this a feasible direction, of course, there are researchers in this effort and exploration, the future research are laying and construction of roads, the scholars in the field of building together.

References