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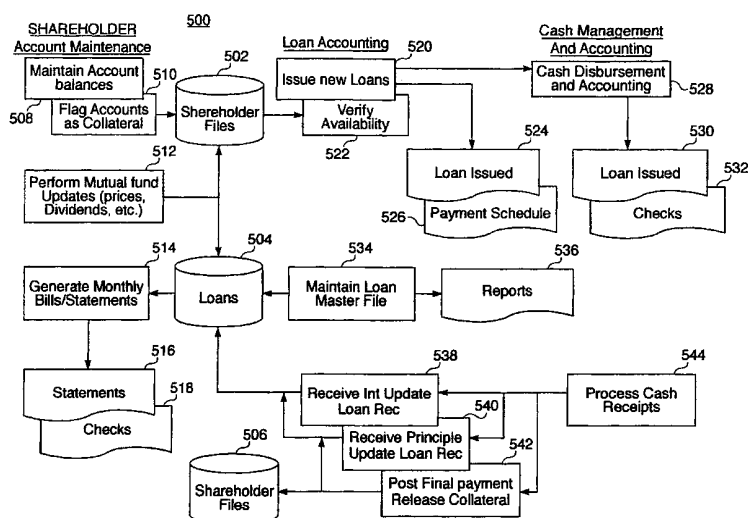
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(54) Title: METHOD AND APPARATUS TO ALLOW CUSTOMIZED INVESTOR BORROWING ON SECURITIES



(57) Abstract: Various methods and systems to allow an individual borrower to customize and self-direct their own loan product to meet individual requirements. An exemplary method includes the following steps on a real time basis: an investor disclosing current ownership of listed securities (512); the investor is then asked to supply additional data covering debts (514); the investor is then prompted to input various borrowing needs and risk tolerance level; the completed database then queries various company databases utilizing various custom software algorithms and obtains a risk assessment of the input securities (512); the completed risk assessment is then mixed and matched through software algorithms with the borrower's criteria; and calculates in a number of different loan packages. After the borrower selects the desired loan that best fits their needs, the borrower then chooses the method by which any default or margin call would be handled.



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METHOD AND APPARATUS TO ALLOW CUSTOMIZED INVESTOR BORROWING ON SECURITIES

This application is related to and claims the benefit of provisional application 60/150,364 filed August 24, 1999, the teachings therein are hereby incorporated herein in their entirety.

FIELD OF THE INVENTION

The present invention relates to the field of computerized on-line banking and investing. In particular, the present invention is directed toward a technique for allowing a consumer to borrow, on-line, against holdings in a mutual fund or securities.

BACKGROUND OF THE INVENTION

Over the past several decades, individuals have used their home ownership as the asset to borrow against for various cash needs via the home equity line of credit or the home equity loan. Many individuals with 401(k) plan assets have turned to the loan facility offered by employers. Borrowing against accumulated "equity" assets is a familiar resource to Americans.

In a survey compiled by the Federal Reserve, equity securities including mutual funds -- for the first time -- surpassed home ownership as the largest percentage of the average American's assets (*New York Times*, 2/11/98).

Proprietary market research indicates many consumers would prefer to borrow using mutual fund assets versus adding to mortgage debt. The only way to borrow against mutual funds or individual securities is through a brokerage account or a private banking account which includes lending.

Few average investors have margin accounts with brokerage firms, (less than 4% of U.S. households), or private banking relationships which include lending on securities. In fact, almost 40% of investors purchase their mutual fund shares directly from the fund companies and many acquire individual corporate securities via company stock option plans. Further, 48% of Internet investors purchase mutual funds directly from fund companies; many say they are adverse to brokerage accounts.

When average investors have large cash needs, the most convenient and hassle-free mechanism is to "redeem" mutual fund shares. Trade association data and private research on mutual fund investors confirm that 5,400,000 households will redeem \$110 billion in 1999 because they need cash.

Major private investors, on the other hand, have the option of obtaining large amounts of cash by borrowing on securities. Unfortunately, in the prior art, only larger investors with suitable financial contacts with banks or the like could arrange such loans. Moreover, most banks and lending institutions found the risk and efforts involved in lending on securities only worthwhile for such large investors. Lending on securities for a large number of smaller "middle" investors would have been too labor intensive a task, and moreover too large a risk for many banks and lending institutions.

Smaller investors could benefit greatly if allowed to borrow on securities. Using securities as collateral, borrowers could take advantage of lower interest rates available for secured loans to purchase automobiles, finance education, home improvement, unexpected medical expenses, and the like - without having to dispose of hard-earned investments.

In addition, prior lending techniques, particularly for consumer lending, tend to use commodity-based pricing. In other words, banks and other lending institutions have traditionally advertised particular rates to attract customers. The use of pre-set rates (whether fixed, floating, or "prime plus" type rates) for all consumers is an inefficient form of pricing. For a secured loan, a standard pricing scheme for all consumers does not accurately reflect the variation in risk associated with each loan. Again, securities loans in the past have generally been made only for larger investors - where the effort and time needed to analyze a portfolio and then monitor the collateral market value versus loan balance were offset by the large amount of money borrowed.

What remains a requirement in the art is to provide a technique to allow mid-level consumer investors access to loans using securities as collateral. It is a further requirement in the art to provide a technique to quickly, accurately, and efficiently analyze a consumer's securities portfolio to determine its net worth and relative risk. It is a further requirement in the art to provide a means of customizing loan pricing and terms for individual consumers based upon, among other criteria, securities portfolio content and risk factors.

It remains a further requirement in the art to provide an integrated software solution to combine loan management software, securities custody and transfer software, securities analysis

and risk analysis software, and consumer interface software into a system for administering such securities-based loans for mid-level consumers.

SUMMARY OF THE INVENTION

The present invention provides various a system and methods to allow an individual borrower to customize and self-direct their own loan product to meet individual requirements. An exemplary method includes the following on a real time basis:

(1) making available the means for an initially unidentified individual investor to disclose his/her current ownership of listed securities by inputting each individual security, number of shares and original acquisition cost basis;

(2) investor is then asked to supply on a voluntary basis, additional data covering current individual debts including the terms and monthly payments;

(3) investor is then prompted to input various borrowing needs such as, but not limited to, amount, loan periods, payment terms, purpose for the loan and type of access to the loan. Alternatively, this portion of the process can be conducted by a qualified intermediary representing the individual investor;

(4) the completed database then queries various company databases utilizing various custom software algorithms and obtains a risk assessment of the inputted individual securities;

(5) the completed risk assessment of individual securities is then mixed and matched through proprietary company software algorithms with the borrowers criteria and;

(6) calculates in an automated fashion a number of different loan packages which vary in their interest rate, payment terms, level of required collateralization, type of access to the loan, each with its own annotated description of the advantages and disadvantages inherent including any potential savings as compared to current debts listed in step #(2), for disclosure to the borrower; or

(7) optionally, a borrower could manually mix and match different listed securities with different loan amounts and terms in a trial and error manner, and through the use of the company's proprietary algorithms and formulas, produce different loan packages;

(8) after the borrower self-directs the selection of the desired loan which best fits his/her needs he/she then chooses the method by which any default or margin call would be handled;

(9) only then is individual personal information requested to complete the loan process. In either of these unique processes, the disclosed embodiments thus permit the borrower to interact with the company's proprietary formulas on a real time basis to achieve a buyer determined loan solution.

BRIEF DESCRIPTION OF THE DRAWINGS

Figure 1 represents a welcome screen a consumer may see upon entering the MutuaLoan.com website.

Figure 2 represents a second screen in the MutuaLoan.com Website, interfacing with the LoanBuilder™ program.

Figure 3 represents a web page screen of a worksheet format.

Figure 4 represents a web page screen of a continued worksheet.

Figure 5 is a block diagram illustrating the major components of the present invention.

Figure 6 is a flowchart illustrating the process of the present invention.

Figure 7 is a screen print of professional affiliates information employed by the present invention.

Figure 8 is a representative account statement of a loan according to the present invention.

DETAILED DESCRIPTION OF THE INVENTION

Using the present invention, a corporation or other business entity may operate as a consumer finance company under state-by-state licensing regulations, or may operate as a sales and servicing marketing company when the loans would be booked directly by a bank or trust company. Such a company would not be subject to Federal Banking regulations (Regs. U & T) nor to Broker-Dealer securities regulations.

Regulations restrict lending on securities/mutual fund shares when the borrowing purpose is to purchase securities on a margin. Because the loans provided in connection with the present invention are non-purpose loans, and margin regulations do not apply, the company has the flexibility to lend at any prudent collateral ratio. The company will not provide investment advice or brokerage services which require SEC registration.

The company will make only "non-purpose loans," i.e., the customer agreement will prohibit the use of the proceeds for purchasing marginable securities. The loan agreement will authorize the bank or trust company holding custody of the collateral to execute a sale of part of the securities when the loan-to-market-value ratio exceeds the agreement, and the customer does not add additional assets to bring the ratio into compliance.

The invention delivers its product through a unique and novel interface which will allow the consumer to list his fund share and security holdings with MutuaLoan.com or other securities holding company and have a custom set of alternative loan products automatically generated. These products will differ in interest rates, terms, fees, collateral ratios and means of access or usage by the consumer. The company's lending terms, interest rates and size of loans will be within most state regulations.

The invention includes electronic transfers of both mutual fund shares and individual securities to effect cost-effective use of transfer agent services. A proven highly scalable end-to-end back office computer solution is implemented at investment management firms. The invention employs sophisticated risk management and volatility analysis software tools provided by independent suppliers to manage collateralized positions.

The company will establish and maintain a fully integrated transactional Web site with two distinct transaction environments for both retail customers and professional intermediaries. Additionally, this site will be designed from the beginning to facilitate private labeling of the company's products and transaction environment for certain key Internet financial portals.

The invention can be expanded worldwide and a foreign site named WorldLoan.net, or other international web site is contemplated. The company will explore licensing arrangements with appropriate foreign entities.

Account servicing and basic customer service will be outsourced to a large experienced high volume processor. The company will retain marketing, initial sales, collateral maintenance and high priority customer service. This outsourcing would be fundamental to allow the company to scale up for accelerated account growth.

The web hosting and company accounting and database applications will be handled by an "application services provider" such as for example, Interpath Communications of Raleigh-Durham, North Carolina.

The company's pricing strategy will be competitive with similar lending facilities using variable lending rates tied to the Prime Rate. The company's strategy is to avoid a commodity-type pricing posture by emphasizing a proprietary, customized loan rate. This rate will be determined by each borrower's unique combination of funds and securities, their volatility and the loan amount. Customized pricing will be used to support the company's strategy to build individual relationships and to differentiate its product from competitors.

A pricing system will be used to determine the lending rate based on a volatility rating for each collateralized mutual fund and security, and by the size of the initial loan, e.g., a bond fund with low volatility would have a lower interest rate than a small cap equity fund; and a \$50,000 loan would have a lower rate than a \$10,000 loan.

A one-time new account volatility analysis fee will be charged at account opening. Transaction fees also will be applied when a customer leaves assets in the custody account after paying off a loan; when terminating a loan before twelve months; or when substituting or changing collateralized securities.

A custody fee (based upon the number of individual mutual funds or securities collateralized) will be charged annually to customers once they have opened an account. This enables the company to create a near "wash" with bank/trust company custodial transaction and safekeeping fees, and also creates consumer awareness that custody services are not free. This awareness is important if the company later elects to add a "custody" service for those who want a consolidated statement service and/or a "line of credit" as a product line extension.

The "service" process concept goes beyond just enabling a customer to determine/design a loan based on hard information (securities value, loan size and interest rates, etc.) but also to factor in soft data like attitudinal information, such as risk tolerance, and thereby tailor the service to emotional comfort levels. The company may not immediately use this type of information in formulas but down the road the company will be adding sophistication to the designer loan concept so that company pricing (interest rates and other options) makes apples to apples price comparatives difficult because of imbedded programming; i.e., bundled pricing to

prevent commodization.

The following outlines screens on the MutualLoan Web site; also these are modifiable to screens a teleservicer would use in over-the-phone information gathering from a customer.

The "copy" in each web screen page will be continuously fine-tuned to customer language/understanding, legalese, selling posture or ultimate Web language. The division of "screens" is not fine-tuned to best practices of information per web page which will be continuously market research.

The following pages assume that the "business process" used by an intermediary signed up with company service would be very similar in process.

An additional potential market is whereby the service would be used as an employee benefit or an executive class benefit, i.e., it may be sold to the corporation much like 401(k) plans where the corporation picks-up only the administrative costs (account analysis fee at set-up and the annual custody costs which the individual pays) or it may be marketed via intermediaries which provide corporate services sometimes via a corporate intranet (e.g., PEOs). When targeted to large corporations with large stock option plans and high incidences of employee stock ownership, the LoanBuilder program will specially modified to include custom calculations for loans using the corporation's stock. This custom feature enables the corporation to provide an extra benefit to executives and employees.

For example, the contracting corporation may accept a portion of the loan risk and

decide to have the LoanBuilder algorithm amended to Private Investor Reserves, LLC of Palm Beach, Florida (PIR)'s Special Employee Stock module where the company's stock, if subject to a collateral maintenance call (more collateral or cash or loan pay-down needed for loan term compliance), is removed from a selling situation by the company's agreement to pay cash to the loan account in order to abort any sale of an employee's stock. The modifications can also include special discounts on interest rates where the corporation may subsidize part of the PIR service or provide the wholesale lending function by backing the corporation's originated loan portfolio.

The LoanBuilder program will also have special uses and modules to be used in 401(k) plan lending programs when the Federal government allows third-parties to service the lending function in a competitive market mode. This lending module will enable the plan participants to self-design their own loans using the mix of mutual funds and corporate stock in her/his 401(k) plan. The distinctive feature here will be an algorithm integrated with LoanBuilder's basic calculations that allow the employer/plan sponsor to devote "matching funds" to support a decrease in market value of the corporation's stock, when part of the loan collateral mix.

The LoanBuilder™ program is a unique feature of the web site because it enables individual investors to self-design a loan and enables professional advisors (intermediaries) to do the same plus add-value by select interactive features that add customized attitudinal preferences into the LoanBuilder's calculations (e.g., risk tolerances, age factors, etc.)

Figure 1 represents a welcome screen on the website and may contain the following statements, prompts or inputs: Welcome to MutuaLoan.com, Self designed loans for

the investor, Unlock your assets with a loan which you design to your needs, Source of cash without redeeming your investments in mutual funds or selling individual stocks and bondsStay InvestedSM with company unique service for unlocking the capital you own without triggering capital gain taxes or changing your asset allocation plan or upsetting your diversification by cashing in your securities assets.

In real time you can privately customize a personal loan secured by your investment assets which you hold outside your retirement programs. The company's interactive program for borrowing follows.

We are an equal opportunity lender. In fact, minimum personal information is required and no credit check is conducted. Your Privacy is the company's most important relationship factor.

Figure 2 represents a second screen on the website and may contain the following statements, prompts or inputs: Welcome to the LoanBuilderSM program which allows you, without obligation and, at the start, no name identification, to design your own loan (\$10,000 loan minimum; maximum \$250,000*) --- without opening a bank account or having to establish a brokerage account. We are not a bank, nor brokerage firm but are regulated by consumer finance and lending regulations.

* for loans over \$250,000 a separate service may be provided - click through to Special Services

Try the program now and find out how you can tailor your loan and why this loan may be the best solution for you. The company does not give you advice, we give you a factual

picture of borrowing options, how these options fit your situation; you are the decision-maker.

You should have in-hand essential information on your securities.

For mutual funds: name of the specific mutual fund, the latest number of shares and average price you paid for those shares and the approximate total market value

For stocks: the company/corporation name and, for preferred issues, the designation

For bonds: the issuer's name, face value denomination, the interest rate and maturity date and number of bonds.

For variable annuities specific information is required.

There are some restrictions. For mutual funds: you should have owned the shares for at least 3 months and the specific fund(s) should have been in existence for one year. For company/corporate stock/bonds: the stock must be listed on the New York Stock Exchange, AMEX or NASDAQ or Bond listings on recognized exchanges.

You can use the loan proceeds for any purpose except for purchases of mutual funds and registered securities - stocks and bonds; the loan agreement requires your acceptance of this condition.

If you prefer, you can have your personal financial planner or advisor do this for you. Please refer them to the Advisor Web site at www.worldloan.net.

It is essential that you answer all the following questions as completely as possible because you will get more accurate answers from the LoanBuilder program. For example, if you input only part of your investment portfolio, you may miss customizing to the optimum interest rate and loan size for your needs.

Figure 3 represents a third screen on the website and may contain the following statements, prompts, or inputs: Accounts. This screen contains your password access and stored information previously entered. One can Qualify Yourself Now - The self-rating questions enable the program to provide some borrowing options which may fit your personality and investing style (for example, borrowing less, than you think you need, may be a better comfort level if you worry about loan repayment):

The LoanBuilder program will provide borrowing options which are confidential to you and in turn you agree that this worksheet process is restricted to your own use; as intellectual property, it is licensed exclusively to you and cannot be used by others. (legal qualifications)

Yourself:

1. Temporary Private Code Name: Please enter a code name _____
2. Please rate yourself (on a scale of 1 to 5): 5 Very Sophisticated Investor to 1 Not Sophisticated (Displayed as a choice of boxes, 1,2,3,4,5 on a horizontal scale)
3. Please rate yourself on investing risk posture (on scale of 1 to 5): 5 Am comfortable with high risk investments to 1 Am very uncomfortable with risk investments

4. Please rate yourself on "doing it yourself" (on scale of 1 to 5): 5 Use no help in investing and managing my finances to 1 Always seek help in managing my investments and finances

5. Please rate yourself on your desire to have a margin of safety (i.e., loan amount as % collateralized assets) in borrowing against your investment assets (on scale of 1 to 5): 5 Prefer high margin of safety 1 Not too concerned with margin of safety

6. Please rate yourself on diversifying both your investments and diversifying your debt providers (i.e., your desire to be not dependent on one bank, one brokerage entity, one lending source, one mutual fund family, one corporate stock) (on scale of 1 to 5): 5 Prefer diversification of both 1 Prefer convenience of one source for both investments/loans

7. Would you like the above information to be used in calculating your borrowing options or not? Yes ___ No ___

8. Would like to have the option and pricing of "loan life insurance" included in the calculations Yes ___ No ___ You need to give us your age _____ years.

9. Would you like an option that shows volatility (how much risk you may experience in a market fall), not only of each security but your whole portfolio and how that matches your risk attitude? Yes ___ No ___

10. Would like an option of illustrating how your financial position would be impacted if you took the maximum loan amount available and invested this into a life insurance-based

instrument or Charitable Trust? Yes ___ No ___

Figure 4 represents a fourth screen on the website and may contain the following statements, prompts, or inputs. This page may be entitled "Enter Your Assets" and is used to gather a list of your investments available for use as collateral for a loan" and prompts the user to list securities available as collateral.

11. Individual Securities: (FULL NAMES as appear on your statements/documents)

Name	# of Shares/Face Value	Estimated Cost Basis (total \$)
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a)

b)

etc.

Which of these securities/funds do you consider as your core holdings, i.e., those which you would be the last you would sell, assuming no great change? Rank order your securities above, starting with the one you wish to hold the longest:

1)

2)

etc.

Assume that one of your securities or a mutual fund, which you would use as collateral for a loan, declined in market value by 20% in a short period of several days, but your loan-to-

market value (collateral ratio) did not trigger a call by us for more collateral or partial selling.

Which of the following actions would you want us take:

a) call you to alert a possible need to sell part of that security if further declines took place or b) allow automatic selling, when by the terms of the loan agreement, this was needed?

a ____ b ____

12. Your Borrowing Needs:

a) Maximum loan need \$ ____ b) Minimum loan need \$ ____

c) Preferred period of repayment (amortization of principal) 24 Months _ 36 Months _ 60 Months

d) Based on what you think would be an acceptable and competitive interest rate for the size and duration you are thinking of, i.e., in what range below are your expectations:

6-7% __ 7-8% __ 6-9% __ 9-10% __ 10-11% __ 11-12% __ Over 12% __

e) Purpose(s) of loan:

Home purchase __ 2nd Home purchase __ Home Improvements __ Auto __

Boat __ Medical __ Start a Business __ Pay-off Debts __ Education __

Other _____

13. How would you want your loan proceeds to be delivered?

- a. mailed check
- b. deposited by wire transfer to your bank account
- c. deposited into a money market account with a debit card

If "c." would you want information from one or several bank affiliates who have such accounts with Internet connections?

If you are satisfied with the information you have given so far, please click Yes and the LoanBuilder will calculate the various loan packages which you may select from.

While this calculation takes place, could you help with a few questions?

Where did you first hear about us?

List of Media - Select Multiple Boxes

Was the foregoing information sufficient to make a decision to complete a loan request, assuming the terms are to your liking? Yes ___ No ___

A fifth screen (not shown) on the website may contain the following statements, prompts, or inputs.

Your sample loan options are as follows (not in any order of preference - it's your choice):

The various selections would be characterized by the factors which were given most weight, i.e., Maximize loan size relative to total collateral; Low loan to asset ratio; lowest monthly payment rate; lower interest rate than first three options.

A sixth screen (not shown) on the website may contain the following statements, prompts or inputs. The loan options you have just seen can be close to your final loan calculation but you can do more designing once you set-up your account.

Our lending rates will move without notice in tandem with changes in the Prime Rate as published in the Wall Street Journal (WSJ). The rates used in your sample calculation were based on the Prime Rate and a base rate which is set at the company's discretion with reference to the collateral ratio, loan size and the securities risk assessment (volatility). The account opening charge is \$XX. The Custody charges are \$YY per security use as collateral annually. Other charges apply only for specific events you initiate, such as terminating the loan before one year has elapsed or for substitutions of securities during the loan duration.

You must [Click here](#) to read entire terms and conditions and then acknowledge your understanding before you can proceed further.

If you now wish to apply for a loan, we require first that you pay the one-time \$XX. account opening and set-up charge by credit card or by a check-by-telephone.

This is a lifetime set-up fee, in that if you pay-off the first loan satisfactorily and then several years later apply for a new loan with new securities and we can verify your account match, your old account will be reactivated without a new account opening charge.

You will have another opportunity to design your own loan with trial and error combinations or select one of the options on Screen 5 as an example, [please click here to have account opening save those worksheets to your file].

Please respond to credit card inquiry (secured by encryption routines) or call 800-xxx-yyy yy ext. a for pay-by-phone check or credit card - you will then receive a temporary password to resume your application. Make sure you save that password.

A seventh screen (not shown) on the website may contain the following statements, prompts or inputs. Thank you for opening an account and now to finalize your loan. Now that you have a feel for how the loan design works, do you want to go through the process with the securities you used on worksheet or a new combination? (system goes back for worksheet information or starts new Final list of securities and runs through the previous questions again.)

Once the customer selects the final combination of collateral and payment choice, the system calculates and delivers a loan term sheet to the screen to which buyer then signifies agreement and form is sent by e-mail for real signature (return by U.S. mail) or is downloaded.

The customer is given choice of creating multi-part forms on-line and then downloading or downloading blank forms for filling out and signature. The multi-part forms require the customer to send the form and its instructions to each mutual fund company or the custody holder of individual securities used in the collateral basket of securities (when no broker or intermediary is involved) - copies go to MutualLoan.com and to Bank of New York (special lock-box) (or in case of an Advisor a copy would also go to customer.) The customer remains in control of the process including the responsibility to getting the securities transferred to a

Custodian bank.

Upon the Custodian bank's receipt of the securities and communicating this to us, MutuaLoan.com would send the loan check or wire transfer to the customer as they selected.

The system of the present invention is shown in Figure 5, wherein a Shareholder account is maintained with loan processing and cash management as illustrated by the computer processing system 500. The system 500, with its various labeled parts and functionality 502 - 544, provides the standard computer data processing steps needed to implement the invention as described in the following implementation of the invention.

The process steps are illustrated in Figure 6 wherein the steps 600 - 634 are shown and implemented as described in the following example. When a prospect "hits" the PIR website, and interest in the program is established, he/she will enter a portfolio of securities to pledge as collateral. Once all securities are entered, the loan matrix will generate a rate based on the risk profile of the portfolio. Each loan rate is unique based on securities held. Rates generated as well as the prospects personal information, such as name, address, tax ID will be "filled" in the proper fields on required documentation.

The client will download completed new account documents from web site. (web site must assist client in retrieving correct forms otherwise documents forms can be mailed out from back-office based on a notification (email or otherwise) from the new account with reference to what assets are pledged. Pages requiring signatures will be clearly marked.

The web site will have the logic to know which custodian is to be used with a particular fund. This is not a client discretion issue. The web programming will match funds

to custodians, and will logically override choices if the prospect has two or more funds, which when set-up individually would go to different custodians, but when part of the same loan collateral will be in the custody of one firm only.

The prospective client will retrieve a Custodian Transfer Form, new account form, custodial pledge letter (agreement between client & PIR restricting account activity) as well as any supporting documentation such as forms for electronic payment of loans. Paperwork will be forwarded by the client to a designated office for processing.

Account Notification: The back-office is notified of new account request at the point at which the loan has been self designed and an initial fee paid. Front office should call software component to be exposed by back-office system to write new account data directly into back-office database. There could also have an email backup notification (email only could be used in early stages).

When a new loan request is written to back-office, it will be recorded into a New Business Worksheet table. This will keep track of details for each new/rollover loan request. If the tax-ID of the account doesn't already exist, then a new customer record will also be automatically setup. For each new loan request, the following basic information will either be automatically recorded from the web site or manually recorded into special "New Business" table which will track new accounts requests and their processing status separate from the main books and records of the system.

For each security collateralized by a loan account:

- a) The system will track loan processing/status are preset points in the account set-up. The account will be given a loan status of "Request" in conjunction with the initial data transfer from the web site.

- b) Tasks will also be associated with a specific loan status. At the "Request" stage, two tasks are created, "received paperwork" and "Documents reviewed/approved."
- c) Customer Service can use the New Loan Request Alert to keep track of new loan requests for which we are awaiting paperwork from the customer.
- d) When paperwork is received from the customer, use the loan status worksheet to mark the open tasks, "received paperwork" and "Documents reviewed/approved" as completed.
- e) Documents will be scanned into the system for reference and attached electronically to the account to which they apply. Assign account numbers if applicable(FT custodian only). After scanned, forward the documents to FT and via the loan status worksheet change loan status(s) to "Documents Sent." Date sent will be stored by the system.

The custodial paperwork will be forwarded to First Trust, Fidelity or another bank/trust company entity chosen to provide this service by PIR. Once the custodian has the paperwork, PIR first must confirm that a custodial account has been set-up. The account will be set-up prior to the funds showing up. Verification will be done visa data feed. When the custodian receives PIR paperwork, the account with identifier will be automatically opened and show up on the data feed absent of positions. When this occurs, use the loan status worksheet to change status to 'Account Setup.'

A data feed will be used to verify that the assets have been secured. The loan status will automatically change from "Account Setup" to "Secure" when the positions are received. If positions never come in, this event will show on the loan status report along with the date the paperwork was sent. If the status has changed due to the receipt of positions, the loan status report will report all such occurrences. The custodian's daily data feed will provide

notification that assets have been transferred and restricted.

While in the "Secure" status, a collateralization check must be performed. The results of the tests will be provided on the Alert section of the Margin Variance Report. If variance is unacceptable to PIR and thus the loan has inadequate collateral, the system will automatically generate a letter/email alerting him/her to the collateral problem, as well as potential solutions such as adding collateral or taking less money. The loan will stay in "Secure" status until the solution is accepted or the assets are returned to the client.

A system worksheet will be generated to show all "Secure" loans. The CFO will approve accounts with acceptable collateral based on their stated loan requirements. Accounts approved by the CFO will automatically have a loan status change from "Secure" to "Funding." Remote/Secure Check generation module for CFO office will produce funding checks and will automatically change account status to "Pending" but not active. A report will be available to monitor "Pending" accounts i.e. Accounts that have not cashed their funding checks.

The system will support multiple check funding. If a referring source charges an origination fee that is to be paid by the proceeds of the loan, two checks will be generated, one for the loan minus the origination charge, and 1 to the referring source. The start date of the loan will be the date the check is cashed (pending JD approval). When the loan proceeds check has been reported as cleared from the wholesale lender, loan status is changed from "Pending" to "Active."

Clients will be billed monthly in arrears. The day the client is funded will establish the start date for the loan. The system will support various payment calculations, but for this example we will use a principal and interest calculation for a variable rate loan. The loan will

vary based on which index/rate the client is pegged to.

The first principal payment on a \$4,800/4 year variable rate loan would be $(4,800 \text{ principal}) / (48 \text{ payments remaining}) + (4,800 \text{ principal} * \text{rate\%/12})$. All accounts will be on the monthly anniversary of the account "Activation" day. The system will generate invoices based on duration of loan minus monthly payments received so clients will be 'penalized' for late payments intuitively by the system.

Accounts are "penalized" if the payment from the preceding has not been received at the time an invoice is generated. Invoices will be generated the day before the cycle period and forwarded to the client on the cycle date. The client will be given 20 days from anniversary date to pay their invoices, as reported by the invoice due date listed on each statement

The system will automatically charge finance charges on delinquent accounts if so desired. The system will track clients that have automatic payments set-up. For example, if a client wants to pay his/her invoice out of a personal checking account, the system will track those clients with that pay option.

The Billing Schedule report will determine which accounts are scheduled to be invoiced for a specified date. It will produce either a prorated report for review, or posting report that can generate invoices for payments due for each month.

The PIR Statement/invoice illustrated in Figure 8 shows units held, market value, principal loan amount due, and payment amount. If the client hasn't paid his/her previous bill, then the cumulative information will appear on the current invoice.

A client will be alerted if their collateral is nearly the "danger zone," he/she will have a window of opportunity to react to a change in the collateral. On the reverse side, a

collateral versus balance review could also show a client with excess collateral, which may generate a new loan, and at some point be integral in a revolving loan scenario.

The statement will be designed for a single page for a window envelope with a tear off portion (not shown) for return payment, formatted with specific invoice identification. It will also include a preprinted return envelope with the lock-box address.

Statements may not be required if payments are arranged to be debited from a bank account. Clients can get current loan information from web site. Otherwise, if client requests a bill to pay, the statement will be sent. If both options are used, Customers can be coded in the back office system to indicate whether statement is required.

Initially, all mailing/handling of statements will be handled in a selected city by the back office. As volume necessitates, statements can be outsourced to a commercial printer with the capability to receive the file electronically, print the statements, fold and mail within a 24-hour window.

Payments made directly by the client will be sent directly to a lock box. The bank providing the lock-box service for receipts should offer a report or data feed of what payments have been received daily. If reported on a feed then an import program can automatically post payments against open invoices. Otherwise, reported payments must be manually posted to invoice records in system.

An accounts/receivable aging report will be available to show delinquent payments at any time. Past Due statements can be automatically generated for overdue accounts with whatever 'urgent action' language is required. Payment amounts over the billable amount will automatically pay down principal when posted.

If a customer pays less than the amount due then difference could increase their principal balance. Legal issues with such a policy may vary state-by-state. If the loan principal is allowed by law to be increased, the collateral must be available. Interest owed would be paid down by adding the balance due to the loan balance.

A second option would be for the system to recognize that a problem exists. While one delinquent invoice may not constitute a collection issue, two may. Parameters should be set that define 2 delinquent invoices and a third current requires action. A certified letter will be sent to the client stating that the loan will be changed to interest only and that interest payments will be taken from the collateral on a monthly basis until the account is current. Action would be taken when the certified card is received back by PIR.

If the amount paid covers the interest for the invoice, and a portion of the principal, the interest is paid down first, then any remaining balance would be applied to the principal. The system would handle the underpaid invoice as delinquent, and would reflect such on statements sent to clients. If interest payments are current, and the balance remaining is principal, correspondence will be generated to the client notifying him/her as to the availability of interest only loan payments.

If principal balance is zero after any payment is posted, then loan account status is automatically changed to "PAYOFF" status. This status will represent that loan is paid off but that we still hold the collateral assets.

When an account reaches "PAYOFF" status, the client will be contacted via UPS overnight, Fedex or USPS. Included in the package will be documentation to reregister the account as well as documentation/literature for a loan renewal. If customer requests that assets are returned then mutual funds or custodian must be contacted to arrange re-registration

(Note: With custodian there is only one entity to contact regarding re-registration.) Loan account is then coded with 'CLOSED' status.

If client wishes to take out another loan, he can return to the web site as a report customer and design another loan. Loan data is transmitted to the back-office as a “rollover” and would appear in the New Business Worksheet. Once a loan request is verified as an existing customer then a new loan account is created for that customer and collateral assets assigned to the new account. Loan account can then go straight into "FUNDING" status. Each loan account may have one or more referrers.

Fees will be driven off the outstanding loan balance. Each referring party will get a certain percentage of the outstanding loan balance. Referral rates are stored in the system. The rates are specific to each referrer. Multiple fee types will be supported. For example, fees paid to the rep will be coded as origination fees from the loan proceeds, or as a standard fee based on outstanding loan balance.

Each fee generated for referrers will be based on the payment-received date of an invoice(s), and then a loan balance from the invoice will be used to generate a fee payable to the referrer.

A Service Fee Schedule will generate a list of service fees payable based on renewal date with an option to produce proforma reports or create open-payables. Service fees will be paid quarterly or annually and in arrears; specific to the date payment is received from the borrower.

Origination fees rates are determined by the referring source. PIR will cap the maximum origination fee allowed. If a higher rate than the PIR ceiling is entered, the user will not be permitted to enter the rate. Rates will vary based on what each referrer charges.

The system will support variable origination fee charges.

The web site will be used to distribute commission and loan account referral information to solicitors and agents in lieu of sending out paper Service Fee statements. Illustrated in Figure 7 is a screen print of Professional Affiliates available to users of the present invention. The web site should show: loan account referred with original loan amount, principal balance, amortization period, Commissions Payable, Commissions Earned YTD and otherwise and will start with a summary page showing the number of accounts, YTD commissions, total principal, etc. The referrer access to the web site will be controlled in the BackOffice system with Access Flag and password.

The remote payment program for the CFO office generates commission checks and marks commissions posted. The system will generate fees to be deducted from paid invoices. The fees due will be generated from a date specific range that is defined by PIR. Fees will be generated from the loan balance of the invoice from system-defined fee rates. There is a need to support the possibility of a referrer having a parent relationship to a firm where payments are not made to the referrer but to the parent firm.

The originating bank may require a report to track collateral in the system against actual collateral in the name of PIR. With a custodian this is much easier to do since it is simply a matter of verifying the custodian feed against the loan accounts. The system will track the relationship between clients and where the loan proceeds originated. The system will also generate PIR outstanding principal by warehouse lender at any time.

State loan requirements will be stored in the system. If a state has a minimum loan requirement, the system will not allow an account to be moved out of "PENDING."

PIR will have historical data provided by Morningstar on all Mutual Funds and Equities that are used as collateral. Historical volatilities as measured by Standard Deviations and other historical measures will all be part of a determined maximum advance rate for each security.

The system will have a collateral margin report to identify active loan accounts whose total collateral asset value falls below a defined ratio to the outstanding principal balance. This report might use several threshold groupings such as a) Below/at principal value; b) 1-5% above; c) 6-10% above; and d) 10-15% above. The report can be designed to allow user to specify thresholds. Each threshold will have a specific PIR action attached to it. For example, any loan within 10% of its collateral could be considered in the danger zone, which could lead to action against the collateral. An account that enters the danger zone would receive immediate notification of a potential problem.

In conjunction with the development of risk zones, a Loan Model Simulator can be added to the system. It will produce historical "what-ifs", such as if a client invested in Fund A on a specific date, and based on a pre-specified loan rate, we will show how the loan performed over user determined durations.

Even though Mutual Funds prices are reported on market closes only, the system will have a somewhat unique theoretical "Beta Testing" feature deployed. In addition to Standard Deviations, Morningstar will also supply Beta, Alpha and R-squared data, which tie into the index that the fund best "fits."

PIR will have the ability to "beta test" funds that best fit a volatile index. In the second quarter of 2000, funds best fit to the Wilshire 4500 Small Cap Index had severe drops. On a day in which PIR monitors tremendous volatility, and potential depreciation of assets,

PIR will be able to theoretically project dangerous LTV's based on the previous days actual close and a theoretical next day close based on "real-time" daily activity.

The "Beta Test" will show theoretical LTV's that may prompt collateral calls a day prior to when the call would have been sent. The theoretical LTV will allow PIR to act a day sooner to when they otherwise would have been able to based on closing prices alone.

The custodial relationship between PIR and the custodians used to hold collateralized assets would allow the client to reallocate assets if he/she feels that would be proper. By signed instruction, disbursements to the clients are not permitted. Included in the documentation package will be a custodian transfer form and pledge agreement, which puts the assets under PIR control at our custodian of choice and "pledges" all or a specified percentage of the account to PIR.

If a client wants to reallocate, they will call the PIR transaction line in West Palm Beach. The order will be taken by PIR and forwarded to a Registered Investment Advisor contracted to act on the client's behalf with the custodians. The system will track portfolio changes caused by reallocations and monitor increased or decreased risk levels.

If a client has "non-pledged" securities in his/her account, disbursements, reallocations and transfers will still be directed through the West Palm Beach Call Center. Custodians will charge transaction fees to the client for such events as a security transfer or sale incurring brokerage fees to the custodian. Daily transactions and positions will be monitored electronically through a custodial platform data feed.

PIR will have the ability to work with numerous custodians if need arises, subject to the availability of electronic data feeds.

Integrated document imaging support for scanning all signed documents for a loan will be part of the back office system. Each loan will have a documents tab that will show the electronically stored documents. Stored documents can be reproduced or faxed directly from the system.

The system will electronically notify a client whose collateral has entered a "notification" zone. The notification of "collateral" calls will be stored along with scanned images on the loan form in the system. Electronic notifications will be automated based on the daily "Margin Variance Report." Accounts that fall with the user defined notification rule will be immediately notified as to the change in account status.

Collateral determination is done upon initial funding. A reserve for collateral losses is created equal to 1.5X the worst one price change of the collateral. In the case that several securities/fund holdings are offered as collateral an aggregated reserve shall be determined by summing the reserves applicable to each security or fund holding. For example, if a Fund A holding with a market value on the day of the advance of \$100,000 has been offered as collateral experienced its largest price negative change in October of 1987 of 26.7% a collateral reserve of 40% or \$40,000 would be established. An advance of up to \$60,000 would be made.

Collateral reserve is always considered a fixed dollar amount established on the day of the advance as indicated above. If the difference between the market value of the collateral at any measurement, as estimated by PIR is necessary, and the then outstanding balance of the loan plus accrued but unpaid interest is equal to or less than $\frac{2}{3}$ of the collateral reserve, an email will be sent to the borrower warning of a possible need to replenish the collateral

reserve or reduce the loan balance.

If the difference between collateral market value and outstanding loan balance plus accrued interest is equal to or less than $1/2$ of the collateral reserve, an e-mail will be sent to the borrower requesting additional collateral or a loan pay down sufficient to create a 40% collateral reserve. The e-mail will also remind the borrower that PIR may have to sell the collateral to satisfy all of the borrower's obligations if the market value of the collateral diminishes further.

If the difference between the collateral market value and the outstanding loan balance plus accrued interest is equal to or less than $1/3$ of the collateral reserve, all collateral is sold, the loan obligation satisfied and the balance of the collateral proceeds remitted to the borrower. The borrower is notified by e-mail of the action. The canceled promissory note is returned to the borrower.

For all mutual fund collateral, an estimate of fund beta will be developed at the time the loan is approved that will be used to estimate current, intra-day unit values that will be the basis of all collateral market value calculations. Collateral will be valued hourly such that any required collateral actions can be executed on a same day basis. For mutual funds or other securities not traded in all of 1987, PIR will use related market indices and an estimate of specific volatility to extrapolate a "worse one-day price decline" for determining the required collateral reserve.

The monthly statements showing both the securities and latest market valuation also contains the volatility ratings of securities and top 10 holdings in each fund in the collateral portfolio. Interest and principal payments and loan outstanding balances would be part of the statement. Other messages will be part of the statement and may include messages about the

company's alliance partners which may have a value-added offering/information.

Upon pay-off of the loan, the customer elects to have securities transferred back to their designee, or with mutual funds, back to the fund to be added back into an open account or to re-open an account.

An optional service of the present invention, directed for senior citizens, may be the creation of a line of credit secured by securities which may have no interest or principal payments but rather a monthly predetermined pay-out of loan proceeds until such time as the collateral ratio requires gradual liquidation of the securities, in effect a reverse-mortgage application which provides retirement income over a specified time.

Another service which may be provided is a special Trust Account (via a company owned Trust company - or off-shore Trusts) with borrowing privileges. In this service, the borrowing would be restricted to purposes which would prohibit borrowing to add marginable securities to the Trust but would include such uses as medical and education. The loan would be structured (business process) to protect the principal from invasion while trust income would pay-off the loan.

Another eventual service addition could be to enable customers to borrow against long-term CDs to help avoid penalties of early withdrawal. If bank CDs (insured) are not considered marginable securities, the loan proceeds could be used to add equities or just add short-term liquidity.

Another product version (and a formula business process) would be an account whereby the customer would be required to transfer, into the Custodian Bank Treasuries and CDs which

may cover the interest and principal payments on a loan on equities so that the customer would not have to make any monthly payments.

A small business service tied to Business CMA accounts would enable borrowing against (restricted) company owned equities and bonds (not company stock) and may be differentiated by enabling owner/managers to use loan proceeds for leveraging business growth.

For international investors, the product may enable investors to elect to denominate their loan in one of several strong currencies to provide currency market preferences. The business process here would be to allow the customer to self-select the currency of record.

Part of the Loan Forms package would be a form on which the customer "initials" each key point of agreement and then signs at bottom as having read, initialled and understood each point. This form could be a key part of the process, in that it is designed/intended to head-off litigation or the customer claiming non-understanding. It also would be part educational by highlighting features and benefits. It would be in large type for ease of reading as well as being a piece which communicates the company's disclosure policy which emphasizes customer understanding.

For example, please read and initial the following key parts of the loan service agreement. It's part of the company's commitment to a long-term relationship and helping you to understand options which may fit your situation:

Important Parts of the Loan Agreement

1. I recognize that when my mutual fund shares are held by the fund family that it is my

responsibility to have them to act in a timely manner in transferring my shares to your custody account at BONY. The company form provided, includes a need for urgency in complying with the transfer. I also recognize that it is to my advantage and the mutual fund company that I leave some shares with them so I get timely communications about their new products and inside developments. _____ (Initials)

2. I recognize that if I am transferring shares of stock or mutual funds or bonds from my brokerage account, the brokerage firm's operations section may not give this action high priority unless I impress upon them that "it's my right to have them transferred expeditiously." I understand that I can call the SEC (tel. number provided) should the brokerage firm delay this action. _____ (Initials)

3. I understand there is a somewhat higher cost option of establishing the account as a Line of Credit which could be drawn upon when most convenient. (For example, some customers sign-up for a loan which can pay the year's tuition for a child or grandchild and they want to make quarterly or semi-annual payments). I realize I can have the loan proceeds as periodic payments to me, if the collateral is in place (that's why we encourage you to put more collateral into custody than you may need at that the start). I also realize I can have a cash money market account plus debit card arrangement whereby once my collateral is in place I can order a loan proceeds transfer to the money market account (not securities - may be some legal consideration here if a certain kind of money market account was judged as a marginable security. i.e., non-bank money market) and the use a debit card to access the funds as needed. _____ (Initials)

4. I understand that if this account were part of my estate, you may have to sell collateralized securities to liquidate parts or all of the loan. _____(Initials)

5. I understand that in times of severe securities declines in market value, you may have to liquidate parts of my holdings to keep my account in compliance with collateral to loan ratios without a preceding call to me. _____(Initials)

6. I understand that the minimum term for the loan or credit line is one year and that if I elect to pay-off the loan and close the account, there are charges which in effect adds an expense which may make the loan inefficient. _____(Initials)

7. I understand that after a year or less that I may be able to skip interest and principal payments but this will increase the principal loan amount due and may increase the ratio of loan to collateral. _____(Initials)

Company Proprietary Business Process for:

Self-Directed Investor Borrowing on Securities

Objectives: To enable individual investors to create a loan on their liquid and unencumbered securities assets which best meets their needs for preserving capital investments, maintaining investment strategies of diversification and risk attuned to personal criteria, optimizing loan interest rates and principal repayment schedules, deferring taxable gains and simplifying record keeping.

Secondarily, to enhance the individual investor's access to systems which provide volatility assessments of their securities, individually and in combination, used as collateral for

borrowing without advice giving.

The Direct Process (the Indirect process via intermediaries follows the same process only the intermediary may have the authority to act in behalf of the client):

Investor responds to the company by requesting information via Internet or 800 line number direct to company. The first part of "application" includes a qualification set of questions which help the inquirer to determine whether the company's product and service can meet their needs. Questions and policy information include (not necessarily in order to be used; the term "securities" used below means either stock, bonds or mutual funds (closed and open) or a combination):

1. The company's (current) product is a fixed amount loan with a minimum of \$10,000 (in most states, but higher in others), for a minimum period of one year (there will be a dollar \$ penalty for earlier pay back in some states) but with no maximum term, requiring securities as collateral to be transferred to custody account maintained by the company at a fully insured bank offering master (omnibus) custody accounts. The borrower, at time of application, self-selects the principal repayment duration, i.e., 24 months, 36 months or other time period. The interest rate would be variable and would be pegged to the Prime Rate at a fixed percent % (basis point spread) above the Prime Rate. The fixed basis point spread above the Prime Rate would be determined by the company's formula using size of loan and the risk factor (collateral ratio) assigned to each security used as collateral. The loan amount would be dependent upon the company's rating system for each security to be collateralized; the loan amount would be % of the market value of each security.

The borrower would have three choices: 1) provide a fixed set of securities as collateral and let the company determine the interest rate, the collateral ratio and the highest loan amount available or the best interest rate; 2) use the company's interactive application with "trial and error" variations to determine which mix of securities and size of desired loan amount yields an acceptable interest rate; and 3) a combination of one and two and then a selection.

The unique process used would be to have the borrower interact with the company's formulas to determine which combination of securities and size of loan proceeds would yield the best solution for the borrower's decision, i.e., this is a process which provides a buyer determined solution.

2. The borrower would be advised that any loan proceeds for a borrowing against these securities could be used only for purposes which did not include buying marginable securities via a broker/dealer margin account and the loan application signature would be the borrower's agreement and understanding to abide by such restriction. The borrower would be advised that the resulting loan account would be private and confidential, that no credit inquiries would be allowed and that no personal credit checks would be used to open the account. The borrower would be advised that there would be an annual "custodial fee" of certain dollars per security or fund transferred as collateral. (This fee would be billed at account opening and annually thereafter and would not be rebated in any way when the loan was paid back or the account closed). The borrower would agree that all dividends and capital gains payouts on collateralized securities would be applied first to reducing any interest past due and then to a pay-down of loan principal.

3. Borrower would be asked to supply a list of current securities owned in borrower's (s') name (outside a retirement plan and not under "restricted stock" rules) that borrower would potentially use to secure the loan. The list would require using the full name of each mutual fund and its abbreviation used in WSJ listings and for each stock or bond with its trading symbol. The borrower would be advised: that this portfolio list is confidential and security protected in its transmission to the company; that the borrower would not have to list all holdings, though it is to the borrower's advantage to list those funds and securities that are most well-known and with long track-records of performance (certain securities and funds would not qualify for use as collateral, e.g., mutual funds and securities in existence or publicly traded less than one year; securities in volatile emerging markets). The borrower would be required to rank order the collateral securities for potential selling should the agreed collateral ratio be breached. The collateral ratio is a percentage (the loan balance divided by the securities' market value), not a fixed dollar amount.

4. The company interactive, real-time response would deliver a loan amount, an interest rate tied to the prime-rate and an option of principal amortization of either two or three years. The customer would then agree using a multi-part loan form specifying the agreed upon terms and would then fill in a form for each security to be collateralized. (Borrowers would be encouraged to leave some shares in the mutual fund account so that once the loan is repaid the shares can be transferred back without opening another account.) The form would direct the borrower's "custodial holder" of the securities (mutual fund company or broker/dealer) to transfer the designated shares to the company's account with the custodial bank or trust company. The borrower would send this form by mail to the custody agent of the securities

accompanied by a copy of a recent statement or other required verification/security information; and form copies would be sent to the company, the custodial bank or trust company.

5. The borrower would also agree to the process which would be conducted by the company should the collateral ratio of the securities be under pressure of being breached. The process has options which again are designed to put the self-directed borrower in as much control as possible would be: 1) Option 1 - the borrower would signify a desire to be personally "called" for additional securities collateral or for loan repayment in cash (partial or full) when the collateral market value falls to a danger zone of being within 10 absolute basis points of agreed collateral ratio and if additional collateral or cash was not provided the company would direct the custody bank to partially liquidate the collateral, starting with those securities designated in the original application, to bring the position back into compliance with agreed collateral ratio with a 10% (absolute) cushion. 2) Option - the borrower would cede all decision- making on maintaining the collateral ratio to the company and the company would direct the selling of portions of the collateral automatically when the danger zone reached 5% (absolute points) of the collateral ratio.

Once the basic product offering was working, the following "product enhancements" would be offered as part of the company process of helping, but not advising, investors to have a seamless series of financial services; these may be incorporated in the original patent application:

6. Line of Credit plus Personal Custody Account - This would be tied to (by an alliance to money market account provider) and would follow the same process only the investor would

be able to draw on the loan funds in increments as needed.

7. Loan Insurance - Credit life insurance that would be tied to a formula that accommodated the tax basis and the capital gain liability so that upon death of a shareholder their heirs would have the loan repaid automatically and additional cash life insurance would be paid to accommodate tax payments on the collateralized securities.

8. Risk Management Enhancer - For those self-directing investors that would like a monthly summary of the risk betas on each of their securities and then an aggregated beta on the total portfolio held in the company's custody, this service may be tied to a proprietary "personal risk tolerance" assessment, self-administered by the investor, and then tied to the actual risk level in the portfolio and the risk of the loan to provide the customer with another measurement of his/her position.

9. Diversification Enhancer - Investors generally do not have the information to assess when or when not their asset allocation is balanced in diversification when they hold mutual fund shares and also individual securities - for example, a person holding \$50,000 in GE shares may also find that a mutual fund holding worth \$100,000 increased their investor holdings of GE because 10% of the mutual fund was in also invested in GE, thereby raising the individual' exposure to \$60,000. This coupled with a volatility measure could provide the investor with information which might suggest a change in fund family allocations.

While the preferred embodiment and various alternative embodiments of the invention have been disclosed and described in detail herein, it may be apparent to those skilled in the art that various changes in form and detail may be made therein without departing from the spirit

and scope thereof.

WHAT IS CLAIMED IS:

1. A data processing system for allowing an individual borrower to customize and self-direct their own loan product to meet individual requirements, comprising:

means for an initially unidentified individual investor to disclose his/her current ownership of listed securities by inputting each individual security, number of shares and original acquisition cost basis;

means for supplying on a voluntary basis by the individual investor, additional data covering current individual debts including the terms and monthly payments;

inputting when prompted various borrowing needs such as, but not limited to, amount, loan periods, payment terms, purpose for the loan and type of access to the loan desired as well as risk tolerance of the individual investor;

means for querying various company databases utilizing software algorithms to obtain a risk assessment of the inputted individual securities;

means for matching the results of the risk assessment of individual securities with the borrowers criteria; and

means for automatically calculating a number of different loan packages which vary in their interest rate, payment terms, level of required collateralization, type of access to the loan for disclosure to the individual borrower.

2. The data processing system of claim 1 wherein an individual borrower could manually mix and match different listed securities with different loan amounts and terms in a trial and error manner, through the use of software implemented algorithms to produce different loan packages to meet his/her needs.

3. The data processing system of claim 1 further comprising selection means for choosing a method by which any default would be handled.

4. The data processing system of claim 1 wherein an individual borrower can interact in real time to achieve the individual borrower's desired loan solution.

5. The data processing system of claim 1 wherein an agent representative receives the individual borrower's information and interacts using software algorithms to obtain loans suitable the individual borrower's needs.

6 A method of allowing an individual borrower to customize and self-direct their own loan product to meet individual requirements, comprising the steps of:

an initially unidentified individual investor to disclosing his/her current ownership of listed securities by inputting each individual security, number of shares and original acquisition cost basis;

the individual investor supplying additional data covering current individual debts including the terms and monthly payments;

inputting when prompted various borrowing needs such as, but not limited to, amount, loan periods, payment terms, purpose for the loan and type of access to the loan desired as well

as risk tolerance of the individual investor;

querying various company databases utilizing software algorithms to obtain a risk assessment of the inputted individual securities;

matching the results of the risk assessment of individual securities with the borrowers criteria; and

automatically calculating a number of different loan packages which vary in their interest rate, payment terms, level of required collateralization, type of access to the loan for disclosure to the individual borrower.

7. The method of claim 6 wherein an individual borrower manually mixes and matches different listed securities with different loan amounts and terms in a trial and error manner, through the use of software implemented algorithms producing different loan packages to meet his/her needs.

8. The method of claim 6 further comprising choosing a method by which any loan default would be handled.

9. The method of claim 6 wherein an individual borrower interacts in real time to achieve the individual borrower's desired loan solution.

10. The data processing system of claim 6 wherein an agent representative receives the individual borrower's information and interacts using software algorithms to obtain loans suitable the individual borrower's needs.

<p> Home Site Languages Company Info FAQs Register </p>	<p> Site map Demo LoanBuilder Accounts MutualLoan.net Local MutualLoan Rep.'s </p>
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"We are the first financial services company that helps you unlock your assets with a loan which you design to your needs"

Find your local MutualLoan Affiliate! Enter Zip Code

CONSUMER BORROWING COSTS
 Prime Rate 9.5% 8/22 2:26 PM

Type	Interest Rate	Fees
CC's	16.25%	\$65
Consumer Loan	15.25%	\$250
Home Equity	12.75%	\$1,975
2nd Mortgage	11.75%	\$1,975
MutualLoan.com	11.50%	\$200

[Live](#)
[Help](#)

"Self Designed Loans For The Investor"

"No Credit Check Required"

"So Unique It's Patent Pending"

"Create Your Own Borrowing Power"

8/24/00 Private investors reserves LLC files it's patent for the "Method & apparatus to allow self direction. Mutualloan

Figure 1

Home | My Account | Smart Examples | Live Help

Welcome To LoanBuilder™

Login

If you have already registered.

Register

If you would like to be able to save your loan Info.

Create A New Loan

Start the anonymous loanbuilding process now! Register Later

— follow

3 Easy Steps

And Get Your Loan Now!

Loan Instructions

1. Enter all your assets in the LoanBuilder, using their ticker symbols. (Use the Symbol Lookup, to find your ticker symbols.)

2. Click on your securities, and see them appear on your loan setup page

3. Choose the loan that's best for you from our selection of most popular loans

4. Apply!

5. Or design it yourself from scratch, in the Self-Design Loan section

6. Apply!

Design Your Loan

Click to Build

Live

Help

Questions ? 800.800.9209 Outside the US 1.561.707.8000 Fax: 800.800.9209

customerservice@MutualLoan.com

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Figure 2

SUBSTITUTE SHEET (RULE 26)

MUTUALLOAN.COM™

Home	Site Languages	Company Info	FAQs	Register
Site map	Demo	LoanBuilder	Accounts	MutualLoan.net
				Local MutualLoan Rep.'s

Accounts

This is a password protected and encrypted page. You need to [Login](#) or [Register](#) to access your account information. We are registered with: Verisign, Ernst&Young and the BBB

[Application Status](#)

Click here to see the loan process in action

[Personal Account info](#)

Click here to check your loan balance and pay off schedule.

[See Saved Work](#)

Click here to access your saved asset lists, along with your saved loans.

[Start A New Loan](#)

Click here to go right to the Enter Assets Page.

[Self-Design Loans](#)

Click here to go to the Self-Design Loan Page.

Live



Help

Questions? 800.800.9209 Outside the US 1.561.707.8000 Fax: 800.800.9209
Customerservice@Mutualloan.com
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Figure 3

Home | My Account | Smart Examples | Live Help

Enter Your Assets

List All Your Assets

1. Gather all your latest statements.
2. Enter complete or partial ticker symbols or names using the text box below.
3. If you are not sure of the symbol, enter a partial symbol or name and use the 'Review Symbol' to find the name and symbol of your asset.

Sort Order ☒ by Name ☐ by Symbol

Symbol or Name

Be sure to enter all your assets at this time, whether you intend to use them or not. This will allow our patent pending Loan Builder to Present you with the greatest range of possible loan options.



Questions? 800.800.9209 Outside the US 1.561.707.8000 Fax: 800.800.9209
customerservice@MutualLoan.com

Figure 4

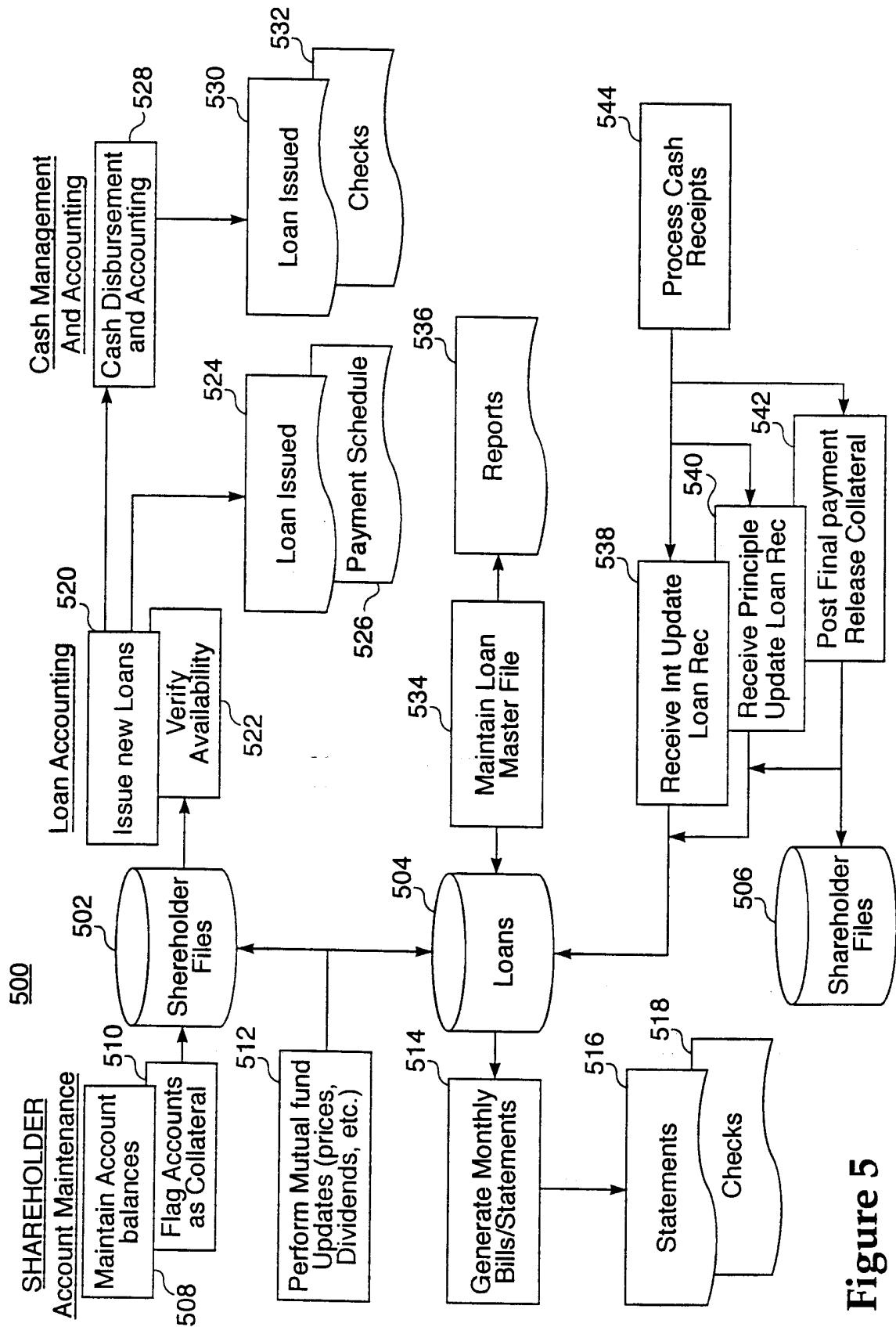


Figure 5

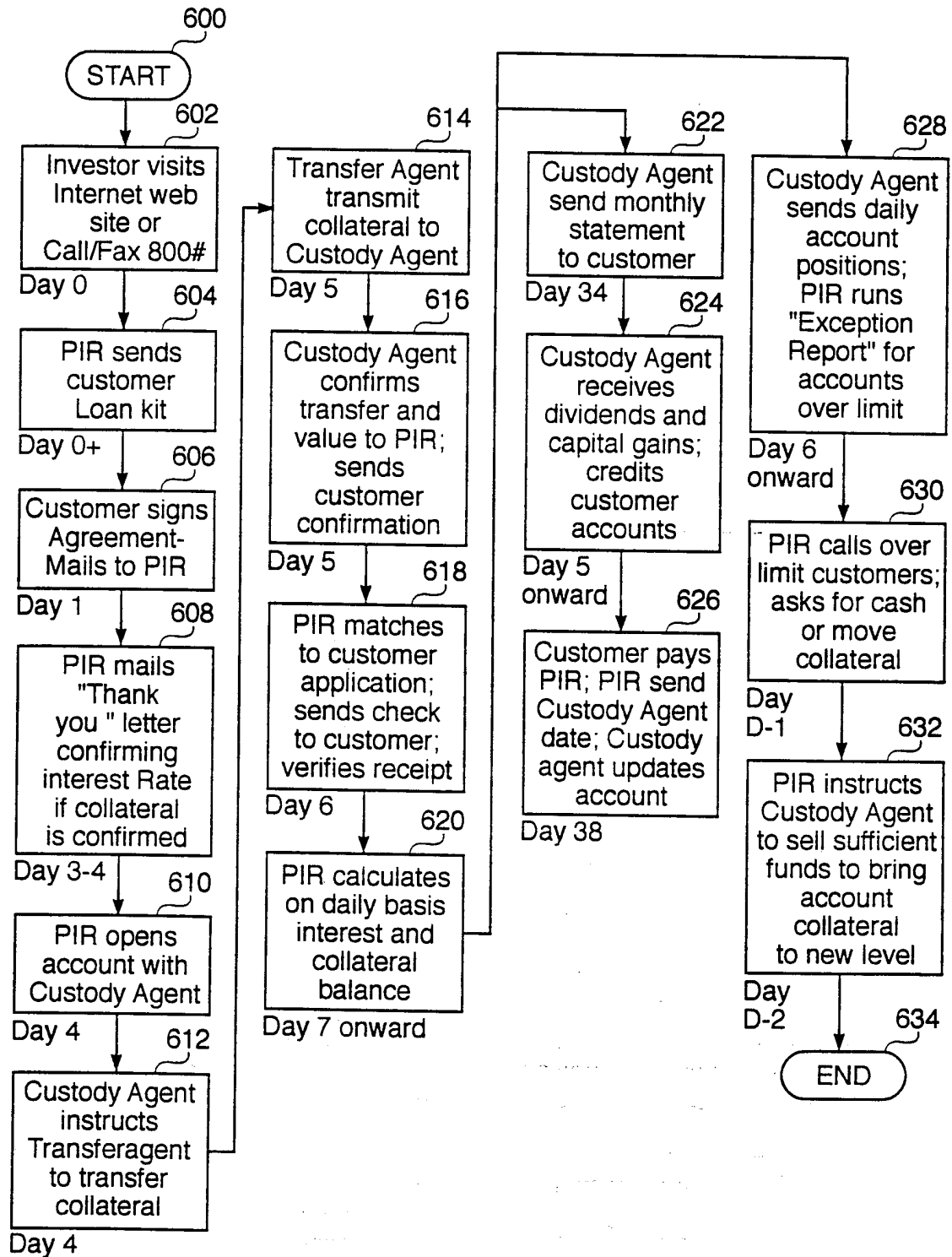


Figure 6



Home		Site Languages		Company Info		FAQs		Register
Site map		Demo		LoanBuilder		Accounts	MutuaLoan.net	Local MutuaLoan Rep.'s

Professional Affiliates



*"Coming soon just for our professional and commercial loan agents."
Our ultra-fast low graphics professional site will feature:*

1. Professionally styled loan proposals with graphs easily customized to represent your business.
2. Quality multi-environment two or three color advertising templates customized right at our web site. They are instantly printed and delivered automatically to your door from your local Kinkos .
3. Easy multi-level commission tracking.
4. Sales agent and customer tracking.
5. Live real-time account processing status.
6. Up to date demographic data and mailing lists for mutual fund owners in your area
7. Auto training demos to show you the best way to leverage our patent pending LoanBuilder and add value for your client.
8. Customer follow-up reminders for your account.
9. Real-time integrated customer service that routes all customer service contacts to your e mail in box from our live customer service reps.

MutuaLoan.net does all the work and allows you to expand your client base and product line while building a strong trailing commission structure!

Questions? 800.800.9209 Outside the U.S. 1.561.707.8000
customerservice@MutualLoan.com
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Figure 7



Private Investor Reserves Corp.
1422 Chestnut Street, #500
Philadelphia, PA 19102

Mr. Thomas Accantino
2065 Roberts Street
Riverside, CA 92507-2699

Account Statment

Reference Number 100124

Billing Date: February, 7, 2000

Questions About Your Statement:

Richard Hamilton
800-963-1122
RHamilton@Mutualloan.com

Copies have been sent to:

Bob Simpson, CPA
Thomas Morgan, Prudential Securities

Your Loan

Loan No.	Customer No.	Opened	YTD Interest Paid	Principal Balance	Current Interest Rate	Loan Advance Ratio
10011	1011	12/30/1999	0.00	30,000.00	*12.600%	** .000

Your Loan Collateral

Quantity	Security	Objective	Symbol	Prices Feb-7-2000	Market Value
420.000	Janus Flexible Income	Multisector Bond	JAFIX	9.27	3,893.40
550.000	Janus Growth & Income	Growth and Income	JAGIX	43.73	24,051.50
750.000	Janus Fund	Growth	JANSX	46.11	34,582.50
Total					62,527.40

Due Date:	Feb 07, 2000
Current Amount Due:	2,820.92
Past Due Amount:	0.00
Additional Fees: (Credits):	0.00
Total Amount Due:	2,820.92
Minimum Payment:	320.92

Figure 8

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US00/23168

A. CLASSIFICATION OF SUBJECT MATTER

IPC(7) : G06F 17/60

US CL : 705/38, 35, 36, 37

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

U.S. : 705/38, 35, 36, 37

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched
NONE

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)
WEST, DIALOG

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 5,940,812 A (TENGE et al) 17 August 1999, col. 4, line 10 thru col. 12, line 11.	1-10
A	US 5,774,883 A (ANDERSEN et al) 30 June 1998, entire document.	1-10
A	US 5,911,136 A (ATKINS) 08 June 1999, entire document.	1-10
A,P	US 5,966,699 A (ZANDI) 12 October 1999, entire document.	1-10
A,P	US 5,995,947 A (FRASER et al) 30 November 1999, entire document.	1-10



Further documents are listed in the continuation of Box C.



See patent family annex.

* Special categories of cited documents:	*T* later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention
"A" document defining the general state of the art which is not considered to be of particular relevance	"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone
"E" earlier document published on or after the international filing date	"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art
"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)	"&" document member of the same patent family
"O" document referring to an oral disclosure, use, exhibition or other means	
"P" document published prior to the international filing date but later than the priority date claimed	

Date of the actual completion of the international search

02 JANUARY 2001

Date of mailing of the international search report

17 JAN 2001

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