



# The 1998 Product Development Metrics Survey

## INTRODUCTION & Table-Of-Contents

We believe that it will be worth your while to complete this survey and request a copy of the results that will be offered to survey participants. This survey covers three significant areas where there is a great deal of current industry activity, the patterns of which may be of interest to decision makers in your organization.

After getting a good definition of your company or organization in Section A, Section B sets out to explore the first hot area. One of the most frequently asked questions today is, "How do companies implement metrics systems in product development?" Section B "Metrics Systems In Industry" attempts to sort out the metrics system approaches being used in industry today.

Sections C and D, "State of Corporate Metrics" and "State of Project Metrics," respectively, focus on two components of a second hot area. Benchmarkers are interested in the specific names and types of metrics that are being used to measure product development in companies. Another often-asked question is, "What is the set of metrics that companies are using in their system?" To avoid the obvious complexity associated with attempting to survey every type of metric in use across systems, GGI has focused on two components in this survey. The first component is the overall metrics that occur at the highest level of a product development organization. GGI calls these metrics "Corporate Metrics." They are product development's piece of the overall set of company-level corporate metrics. Most companies now attempt to measure the overall results of their engineering and product development resources and organizations, thus comparisons should be possible in the late 1990s. The second component, which is also now possible to compare across companies and industries, is the "set of metrics that is used to measure project/product development efforts and when the measures are taken or applied." GGI calls these metrics "Project Metrics," recognizing that the project-type of metrics are specifically within the realm of new product development. Some level of consistency and practice in the areas of Corporate and Project metrics should be emerging and benchmarkable now.

The third and final hot area focused on in this survey is in Section E—"Linkage of Project Performance To Reward and Recognition." Many companies, the ones having a system that generates a set of metrics consistently across time, are now in a position to tie performance and reward/recognition. This final section surveys how rewards and compensation tie in to new product development projects.

- There are five sections in this survey,
- A. Respondent Profile
  - B. Metrics Systems In Industry
  - C. State of Corporate Metrics
  - D. State of Project Metrics
  - E. Linkage of Project Performance To Reward & Recognition

### SECTION A RESPONDENT PROFILE

The purpose of this initial section is to be able to correctly categorize your company within the population of companies that will respond to this survey. Persons, such as yourself, who wish to compare their response to the overall results, usually want to compare with other companies of similar size and type. We are trying to do a good job here on assessing one of the most sensitive up-front tasks in order to achieve the end results that most people seek. Please do your best to characterize your company.

*This is the address to which the survey results will be mailed.*

A1. Person completing survey: Name: \_\_\_\_\_  
 Title: \_\_\_\_\_  
 Company Name: \_\_\_\_\_  
 Address: \_\_\_\_\_  
 \_\_\_\_\_

Phone: \_\_\_\_\_ Fax: \_\_\_\_\_ E-Mail: \_\_\_\_\_



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A2. Is this a  public or  private company?  
 Would you like a copy of the results of this survey?  Yes or  No

A3. For what type/scope of company or organization will you be responding to the questions regarding metrics in this survey? (Check the one that best applies.)

- |  |   |
|--|---|
| <input type="checkbox"/> Parent Corporation [A P/L Unit]         | <input type="checkbox"/> Functional Org/Dept. [Cost Center] |
| <input type="checkbox"/> Strategic Business Unit/HQ [A P/L Unit] | <input type="checkbox"/> Manufacturing Plant [Cost Center]  |
| <input type="checkbox"/> Division/Business Unit/Grp [A P/L Unit] | <input type="checkbox"/> Other: _____                       |

A4. Identify your company's industry or service: (Check the one that best applies.)

<input type="checkbox"/> Aerospace	<input type="checkbox"/> Defense	<input type="checkbox"/> Medical Products
<input type="checkbox"/> Automotive	<input type="checkbox"/> Durable goods	<input type="checkbox"/> Metals
<input type="checkbox"/> Chemical	<input type="checkbox"/> Education	<input type="checkbox"/> Oil/Gas
<input type="checkbox"/> College/Univ. R&D	<input type="checkbox"/> Electronics	<input type="checkbox"/> Pharmaceuticals
<input type="checkbox"/> Communications	<input type="checkbox"/> Engineering/Contract Design	<input type="checkbox"/> Research/Nat'l Labs
<input type="checkbox"/> Computers	<input type="checkbox"/> Food	<input type="checkbox"/> Semiconductors
<input type="checkbox"/> Construction	<input type="checkbox"/> Heavy Machinery	<input type="checkbox"/> Telecomm. Products
<input type="checkbox"/> Consulting/Services	<input type="checkbox"/> Industrial products	<input type="checkbox"/> Textiles
<input type="checkbox"/> Consumer Products	<input type="checkbox"/> Materials	<input type="checkbox"/> Other Ind. _____
<input type="checkbox"/> Software-Web	<input type="checkbox"/> Software-Digital	<input type="checkbox"/> Software-Embedded
<input type="checkbox"/> Consulting	<input type="checkbox"/> Market Research	<input type="checkbox"/> Financial Services
<input type="checkbox"/> Government	<input type="checkbox"/> Utility	<input type="checkbox"/> Other Svc. _____

A5. Sales revenue over your last full year: (Check the one that best applies.)  
 <\$25M     \$25-100M     \$100-250M     \$250-500M     \$500M-1B  
 \$1-5B     >\$5B

A6. Number of full-time employees: (Check the one that best applies.)  
 1-500     500-1000     1000-5000     5000-10,000  
 10,000-25,000     25,000-50,000     50,000+

A7. Please indicate the types of manufacturing operations covered by the metrics discussed in this survey: (Check all that apply.)

- Process Mfg     Repetitive Mfg     Discrete Mfg     Job Shop/Customized Mfg

	North America	Europe	Asia	Rest of World
Sales	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
R&D	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Mfg	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

A8. Places your company does business: (Check all that apply.)

A9. What function do you personally perform in the company? (Check only one.)

- Mgt     Sales     Mktg     R&D/Engrg     Mfg-Production     Mfg-Purchasing/Materials  
 Quality     Environ./Safety/Regulatory     Finance     Information Systems     HR



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## SECTION B METRICS SYSTEMS IN INDUSTRY

Every product development company/organization has a product development metrics system of some type. Some systems are simple and manual, some are automated and complex, and there is everything else in-between. What is the architecture and technology of the metrics system supporting product development in your company?

B1. [Check One Only] What periodic interval best describes the visibility of metrics and metrics reporting at the top level of the product development organization? Continuous, I sleep with metrics.   
Daily   
Weekly   
Monthly   
Quarterly   
Semi-Annual   
Annual   
Every 2-3 years, then it dies down.

B2. [Check One Only] The state-of-architecture of the product development metrics system used at my company can be best described by one term below.

- Centralized  Single, common, shared, vertically integrated
- Distributed-Common  Top section, linked to a number of like systems
- Distributed-Hybrid  Top section, linked to a number of unlike systems
- Decentralized-Common  A number of like systems
- Decentralized-Hybrid  A number of unlike systems
- Ad-Hoc  Unlike systems unevenly applied and utilized

B3. [Check One Only] The state-of-automation of the product development metrics system used at my company can best be described by one term below. Please check the best answer. The answers listed below are intended to be mutually exclusive. Only one answer should be necessary for your response.

- Fully automated system/database collects and stores metrics - for a number of years now \*
- Fully automated system/database collects and stores metrics - contains 1-2 years of data \*
- Fully automated system collects and reports defined metrics when needed
- Partially automated system collects and reports metrics when needed, some manual entry
- Partially automated system results from employees preparing periodic spreadsheet reports
- Manual system results from professionals presenting data in consistent presentation format
- Manual system results from professionals sending in data ad-hoc, and/or as it occurs
- Manual system results from administrators tracking down professionals for numbers

If you checked either of the first two answers above marked with an “\*,” then does your storage ability reside in a spreadsheet, a database, or custom-developed system?

- Custom-Developed System
- Spreadsheet
- Database

If you checked either of the first two answers above marked with an “\*,” then how many years of information and how many projects are contained in your company’s “historical repository.”

Number Of Years Of Information In Repository (Write in approximate number.)  Years

Number Of Projects In Repository (Write in approximate number.)  Projects



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B4. [Check One Only] What department(s) or person(s) is/are the “owner(s)” of the product development metrics system? The “owner” is the person for whom the metrics are prepared for.

- Owner(s) CEO/COO/President/EVP
- CFO - Chief Financial Officer
- CQO - Chief Quality Officer
- General Manager and/or Business Unit Manager [ie: P/L Responsibility]
- Shared Between VP Marketing, Engineering, and Manufacturing Functions
- Shared By VP Engineering & VP Manufacturing
- VP Product Development/Engineering
- Shared By Direct Reports to the VP Product Development/Engineering
- A Designated Person within Product Development/Engineering
- Engineering Controller/Comptroller
- Engineering Quality Department
- Engineering Metrics Department [A DEDICATED ORGANIZATION FOR METRICS]
- Company Quality Function
- Company Finance/Accounting Department
- Other: \_\_\_\_\_

B5. [Check One Only] What department(s) or person(s) is/are the “administrator(s)” of the product development metrics system? The administrator typically coordinates most of the resources to insure that the information in the system is being updated and maintained. The “administrator” is the person who does the majority of the preparing.

- Administrator(s) Administrators for VP Engineering & VP Manufacturing
- Administrators for VP Engineering
- A Designated Person within Product Development/Engineering
- Engineering Controller/Comptroller
- Engineering Quality Department
- Engineering Metrics Department [A DEDICATED ORGANIZATION FOR METRICS]
- Engineering Information Systems Department
- Company Quality Function
- Company Finance/Accounting Function
- Company Management Information Systems Function
- Other: \_\_\_\_\_



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## SECTION C STATE OF CORPORATE METRICS

This section focuses on Corporate Metrics for product development. They are the overall metrics that occur at the highest level of a product development organization. Corporate Metrics are product development's piece of the overall set of company-level corporate metrics. These metrics typically are collected and reported with the same periodicity as financial statements. They are therefore measured at specific calendar time intervals at least annually.

Most all companies now attempt to measure the overall results of their engineering and product development resources and organizations. Comparisons should be possible in the late 1990s. What measures does your company use to measure overall investment and results? How frequently does your company apply the measures?

C1. Estimate, as best as possible, the distribution and emphasis of metrics in the system that your company uses. The areas listed below are intended to be mutually exclusive. Only one answer should be necessary for your response.

Please respond to the statement: "Of the metrics in use in product development at my company, the relative percentage of management review efforts are allocated as follows below:"

Corporate/Overall	Overall R&D performance	<input type="text"/> %
Project	Specific development project(s) performance	<input type="text"/> %
Functional	Specific functional organization or individual performance	<input type="text"/> %
Improvement	Specific internal improvement effort(s) performance	<input type="text"/> %
	Other: _____	<input type="text"/> %
	Total of all management metrics review activities	<input type="text"/> 100 %

C2. Which of the following Corporate Metrics are in use at your company? Please check all that apply. To qualify as "in use," these metrics should: (1) be measured at least on an annual basis; (2) be visible to all members of the top management group as active ongoing tools; (3) be stored in a manner that numerous people in the organization could find them easily; and (4) have some reliability in that the method used to calculate them is consistent from year to year. Please be strict in applying this definition of "in use" when responding to the measures listed for your consideration below.

### Throughput Related - Capacity

- Number of Ideas/Concepts Reviewed
- % of Concepts Accepted/Rejected
- Number of Approved Projects - Not Started/Backlog
- Number of Approved Projects - Ongoing
- New Products Completed/Released
- Total Active Products Supported
- Active projects per engineer or developer or scientist
- Other: \_\_\_\_\_



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## Income Related - Volume

- Current-year % sales due to new products released in the past N-years
- If used, what is N =  year(s) (i.e., past 1, 2, 3, 4, 5 years)
- Average first- N year(s) sales of new products
- If used, what is N =  year(s) (i.e., past 1, 2, 3, 4, 5 years)
- Average N-year profit/contribution of new products
- If used, what is N =  year(s) (i.e., past 1, 2, 3, 4, 5 years)
- Current-year % sales due to total technology licensing
- Current-year % sales due to total royalty income
- Current-year % sales due to total NRE—non recurring engineering income
- Other: \_\_\_\_\_

## Income Related - Performance

- Average products supported per engineer or developer or scientist
- Average sales per engineer or developer or scientist
- Average profits per engineer or developer or scientist
- Average new products released per engineer or developer or scientist
- Average new product sales per engineer or developer or scientist
- Average new product profits per engineer or developer or scientist
- Other: \_\_\_\_\_

## Investment Related - Volume

- R&D spending as a % of sales
- Also, Research % spending is separate from Development % spending?
- Also, Product % spending is separate from Process % spending?
- % Increase/decrease in R&D headcount
- % Resources/investment dedicated to new product development
- % Resources/investment dedicated to sustaining existing products
- Internal engineering staffing ratios
- Cross-functional staffing ratios
- Other: \_\_\_\_\_



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## Investment Related - Performance

- Average development cost per project/product
- Average capital cost per project/product
- Other: \_\_\_\_\_

## Asset Related - Volume

- Total patents filed/pending/awarded
- Total industry standards planned/pending/achieved
- Other: \_\_\_\_\_

## Asset Related - Performance

- Average patents per professional
- Other: \_\_\_\_\_

## Program/Project Management Related - Performance [Averages Across Projects]

- % First pass design success
- Other: \_\_\_\_\_
- Other: \_\_\_\_\_
- Other: \_\_\_\_\_



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## SECTION D STATE OF PROJECT METRICS

This section focuses on Project metrics. A Project is defined as an approved investment of resources and a team/organization to produce a commercializable product in a specified time period, typically ending at or shortly after product launch. Project metrics are not intended here to include cost reduction and/or productivity improvement projects; they include only new product development projects that result in saleable products. What measures does your company use to measure projects? How frequently does your company apply these measures?

- D1. Are a set of standard measures used across all development projects? Please check only one box.
- Yes, a standard set of measures is used across all projects.
  - Yes, some standard measures are used across projects.
  - No, there are no standard measures used across all projects
  - No, projects are not specifically measured at our company.

If yes, roughly how many different measures make up the standard set?  ie: 3, 8, 11, 25

If yes, has the standard set changed in the past ten years?

If yes, has the standard set changed in the past five years?

If yes, did the standard set change in 1997?

If yes, can you foresee the standard set changing in the next five years?

If no, can you foresee a standard set in use at your company in five years?

D2. What time intervals does your company use to measure product development projects? Please check the box next to the sentence that best describes your management time intervals for metrics.

- My company primarily tracks projects on a periodic calendar basis. Projects are reviewed at weekly, monthly, bi-monthly, quarterly, semi-annually, and/or annually, in a manner similar to the management of other development operations.
- My company primarily reviews projects only at specific predetermined points (milestones) in projects, and/or when projects are in trouble and need attention. Projects are not reviewed on a calendar basis, only at predetermined points/milestones of projects.
- My company reviews projects both at specific predetermined points/milestones and on a periodic calendar basis as well.





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D3. Projects, unless they are canceled sometime during development, result in a product that must be commercialized and subsequently supported by manufacturing operations as an active product. The product development investment is complete, and the launch and sustaining engineering costs now begin. Meanwhile, with any luck, the product is generating the revenues and profits that were forecast for it. In some companies, products stay with engineering for a long time. In other companies, products are released forever to manufacturing and to marketing/sales. How is your company monitoring the results?

Are post-launch project/product reviews systematically conducted by a cross-functional management team consisting of marketing, engineering, manufacturing, finance, and/or other functions for each new product for the purpose of seeing if the product results met the original technical and business goals?

- Yes, all new products are systematically reviewed against their goals after launch
- Yes, some new products [not all] are systematically reviewed against their goals after launch
- ....Approximate percentage with cross-functional post-launch review  %
- No, individual functions and/or managers review projects separately within their functions
- No, cross-functional post-launch project/product reviews are not conducted

If yes, are there specific target points after a product launches that reviews are conducted? Or, are reviews done during periodic and/or annual operational and planning cycles as a batch across active/key products.

- As a batch across active products  Yes or No
- Targeted project/product reviews\*\*  Yes or No

If reviews are targeted\*\* on a per product basis, what are the common time periods that targeted reviews are conducted after any given product launches? (Please check all that apply.)

- Six months after product launch
- One year after product launch
- Two years after product launch
- Three years after product launch
- Four years after product launch
- Five years after product launch
- End-of-life/Obsolescence
- Other: \_\_\_\_\_

If reviews are targeted\*\* on a per product basis, what is the average number of times a project/product [targeted to be a reviewable one] is reviewed after it is actually launched?  Number

D4. All projects are measured at some level. Company practices vary widely. Most companies, however, whether formally or informally, approve projects because certain information basic to managing businesses has been estimated in advance. What Project Metrics does your company/organization currently use for a "typical" project? When does it first measure each metric? When and how often does it update the initial estimates?

Please refer to the full-page diagram on the next page. (Please check the box(es) that most closely represent the points where all key project and/or product metrics are first calculated, and/or then updated.)

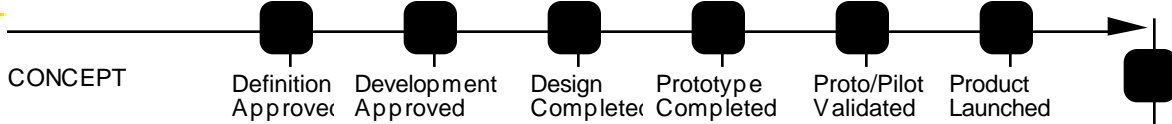


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My Company Does Not Perform Any Of The Metrics/Activities Listed



DEFINITION DESIGN PROTO VALIDATION SCALE-UP LAUNCH



*Frequently Used Project*

- First-Year Sales Volumes
- Three-Year Sales Volumes
- Five-Year Sales Volumes
- Lifetime Sales Volumes
- Total Product Contribution

- Target Product Price
- Target Product Cost
- Target Gross Margin %

- Project Schedule/Time-To-Mkt
- Schedule Slip Rate

- Product Requirement Changes
- Product Specification Changes

- Marketing Promotion Costs
- Development Capital

- Time-To-Profit (Months,
- Breakeven Time (Months,
- ROI or Payback
- IRR or NPV
- RONA or Other Asset

*Other Frequently Used*

- Write In: \_\_\_\_\_
- Write In: \_\_\_\_\_
- Write In: \_\_\_\_\_
- Write In: \_\_\_\_\_
- Write In: \_\_\_\_\_

METRIC IS ESTIMATED OR BALLPARKED WHEN NEW IDEA IS FIRST BROUGHT TO MANAGEMENT ATTENTION	METRIC IS FIRST CALCULATED WHEN NEW IDEA IS STUDIED AND APPROVED	METRIC IS FIRST CALCULATED AND/OR UPDATED AT THE END OF DESIGN	METRIC IS FIRST CALCULATED AND/OR UPDATED WHEN THE PROTOTYPE IS BUILT	METRIC IS FIRST CALCULATED AND/OR UPDATED IN PREPARATION FOR THE FIRST PRODUCTION RUN	METRIC IS FIRST CALCULATED AND/OR UPDATED AT PRODUCT LAUNCH	METRIC IS FIRST CALCULATED AND/OR UPDATED AFTER THE PRODUCT HAS BEEN ON THE MARKET
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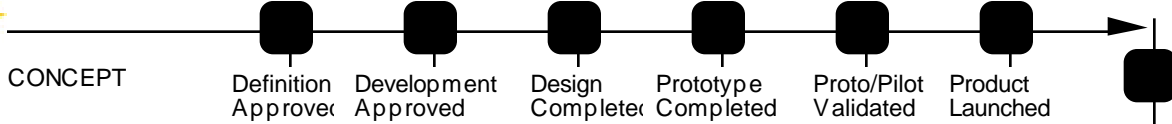


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My Company Does Not Perform Any Of The Metrics/Activities Listed



DEFINITION    DESIGN    PROTO    VALIDATION    SCALE-UP    LAUNCH



### Company-Unique

Unique internal metric weighing several project factors [eg. Delco Bullseye]

### Emerging Project

% Reuse Of Design/Property  
% Digital Design/Simulation

% Outsourced Design  
% Outsourced Manufacturing

% Concurrency Of Team

% Phases On Time

% Milestones On

% Design Reviews On

% Documents On Time

Write In: \_\_\_\_\_

Write In: \_\_\_\_\_

Write In: \_\_\_\_\_

Write In: \_\_\_\_\_

Write In: \_\_\_\_\_

Write In: \_\_\_\_\_

Write In: \_\_\_\_\_

Write In: \_\_\_\_\_

Write In: \_\_\_\_\_

METRIC IS ESTIMATED OR BALLPARKED WHEN NEW IDEA IS FIRST BROUGHT TO MANAGEMENT ATTENTION

METRIC IS FIRST CALCULATED WHEN NEW IDEA IS STUDIED AND APPROVED

METRIC IS FIRST CALCULATED AND/OR UPDATED AT THE END OF DESIGN

METRIC IS FIRST CALCULATED AND/OR UPDATED WHEN THE PROTOTYPE IS BUILT

METRIC IS FIRST CALCULATED AND/OR UPDATED IN PREPARATION FOR THE FIRST PRODUCTION RUN

METRIC IS FIRST CALCULATED AND/OR UPDATED AT PRODUCTION LAUNCH

METRIC IS FIRST CALCULATED AND/OR UPDATED AFTER THE PRODUCT HAS BEEN ON THE MARKET



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### SECTION E LINKAGE OF PERFORMANCE TO REWARD & RECOGNITION

One of the activities that typically lags performance improvement initiatives, due to its wide-ranging implications and the overhead that results from it, is tying compensation to actual performance. Does your company tie developer and/or management compensation to new product performance?

E1. Is compensation tied to performance in executing and launching new product development projects/products? This question is specific to a project and the resultant product's performance. Do not include overall department budget goals and other operational or financial aspects of incentive systems—include only project-product launches. [Total Compensation = Salary plus all Bonuses] [If the answer is yes, write "yes" in the left box. If you know the actual percentage of employee compensation at risk for projects, please write that in the box immediately to the right containing the "%" sign.]

	<u>Marketing</u>	<u>Engineering</u>	<u>Manufacturing</u>
	YorN, If known	YorN, If known	YorN, If known
Top Manager/GM/VP/Dir.	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %
Level-One/Functional Manager	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %
Project Managers & Team Leaders	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %
Team Members - Core Team	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %
Team Members - Support Team	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %	<input type="checkbox"/> <small>Yes or No</small> <input type="text"/> %

E2. Are Team performance review forms routinely used during and/or at the end of projects to review team member and/or team leader performance on the project?  Yes or No

E3. Are Team performance review form results routinely considered in addition to Functional performance review forms at the time of the annual compensation award?  Yes or No

E4. Do "bottom-up" reviews exist by which lower levels of management/employees review upper levels of management such as team members reviewing team leaders or program managers?  Yes or No

If Yes, how many levels upward do employees review their managers?

- Next/one level up [check box]
- Two or more levels up [check box]

If Yes, are "special confidential steps" taken to insure anonymity of the upward review?

- Yes, we use an internal process to handle the issue [check box]
- Yes, an outside services firm is used to maintain confidences [check box]
- Yes, we utilize an automated phone/computer data entry system [check box]
- No, the reviewed manager views the subordinate's review [check box]

If Yes, please indicate the number of years using "upward reviews" [ # of yrs.]  Years



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E5. Does your company ever give out ad-hoc financial awards or bonuses specifically tied to performance in executing and launching product development projects? Please exclude from your answer technical achievements such as inventions and patents.

Yes or No  Yes or No

If yes in 1997, how many awards were given out? Indicate the number of 1997 awards.  Number

What was the approximate total population of people that could have received these awards?  Number

How many development projects were completed in 1997?  Number

E6. Does your company ever give out ad-hoc financial awards or bonuses specifically tied to functional and/or technical achievements such as inventions and patents? Please exclude from your answer management achievements such as on-time projects or meeting cost goals.

Yes or No  Yes or No

If yes in 1997, how many awards were given out? Indicate the number of 1997 awards.  Number

What was the approximate total population of people that could have received these awards?  Number

E7. Does your company use nonmonetary recognition techniques for performance in executing and launching product development projects? This question is specific to a project and the resultant product's performance. Please exclude management promotions, inventions, patents and other "standard operational announcements" from your answer.

Yes or No  Yes or No

If yes in 1997, how many recognitions were given out? Indicate number of 1997 recognitions. [If team recognitions were given out, please count each member of the team as "one."]  Number

What was the approximate total population of people that could have received these recognitions?  Number

If yes in 1997, what forms of recognition were used? Please check all answers that apply.

Verbal, in private setting

Verbal, visible to employee population

Verbal, other \_\_\_\_\_

Written, letter of commendation to personnel file

Written, internal company publication

Written, external industry publication

Written, other \_\_\_\_\_

Gifts, significant monetary value

Gifts, insignificant monetary value (pens, shirts,..)

Gifts, other \_\_\_\_\_



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For survey results please visit our online-store at

<http://www.goldensegroupinc.com/cgi-bin/catalog.cgi>