



MAPPTM

(Motivational Appraisal of Personal Potential)

MAPP Appraisal

Technical Reference

International Assessment Network, Inc.
7400 Metro Blvd, Suite #350
Edina, Minnesota 55439
Ph.: (952) 921-9368 Fax: (612) 844-9025
info@assessment.com

Copyright 1995, International Assessment Network

◆ Table of Contents

◆ Mapp Worker Trait Code System	4
◆ Technical Reference – Worker Trait Codes	5
Routine, organized, methodical procedures	5
Interest In Job Content	6
0 <i>Output drive: production, goals, efficiency</i>	6
1 <i>Physical work with materials, tools, equipment</i>	6
2 <i>Direct business contact and interaction with others</i>	6
3 <i>Routine, organized, methodical procedures</i>	6
4 <i>Management of social or organizational activities</i>	6
5 <i>Work for personal gain, recognition, status</i>	6
6 <i>Concerned with people, communication of ideas</i>	6
7 <i>Technical, scientific interests and skills</i>	6
8 <i>Abstract, innovative, creative activities</i>	6
9 <i>Nonsocial procedures, operations or functions</i>	6
Temperament For The Job.....	17
0 <i>Evaluation: logical study, analysis</i>	17
1 <i>Change and variety: accept, utilize, cause change</i>	17
2 <i>Routine activity set by schedule or operations</i>	17
3 <i>Work under management or supervision by others</i>	17
4 <i>Plan, control, direct activities of others</i>	17
5 <i>Organizational involvement, teamwork, roles</i>	17
6 <i>Independent, self-planned, self-performed activity</i>	17
7 <i>Aggressively influence, persuade, get agreement</i>	17
8 <i>Handle responsibilities, choices, decisions</i>	17
9 <i>Intuition, creativity: ideas, concepts, options</i>	17
X <i>Provide service dedicated to interest of others</i>	17
Y <i>Work with detail, data, records, inventory</i>	17
Aptitude: Mental, Perceptual, Sensory/Physical	30
C <i>See and sense colors, shades, patterns, textures</i>	30
E <i>Simultaneous skills in complex physical tasks</i>	30
F <i>Mental/Sensory skills in handling fine detail</i>	30
G <i>Intellectual and/or Analytical orientation</i>	30
K <i>Mental/Sensory coordination of physical action</i>	30
M <i>Manual dexterity in routine “workbench” activities</i>	30
N <i>Computational or analytical use of numbers</i>	30
P <i>Sensory/Mental awareness of “pieces of the picture”</i>	30
Q <i>Sensory/Mental awareness of detail per se</i>	30
S <i>Mental/Sensory awareness of “the big picture”</i>	30
V <i>Literary and/or Communicative orientation</i>	30
People: Relationships, Roles, Interaction	42
0 <i>Mentor: size up people, personalities, motives</i>	42
1 <i>Negotiate: confront, communicate to achieve goal</i>	42
2 <i>Instruct: teach, train, influence, demonstrate</i>	42
3 <i>Supervise: plan, manage work activity of others</i>	42
4 <i>Entertain: to deliberately influence others</i>	42
5 <i>Persuade: assertively influence, convince others</i>	42

6	<i>Service communication: voluntarily inform others</i>	42
7	<i>Social service directly benefiting others</i>	42
	Things: Engineering, Operating, Sensory/Physical	51
0	<i>Engineering, technical planning, installation</i>	51
1	<i>Precision/quality: technical, mechanical standards</i>	51
2	<i>Operate/control: on-site machine operation</i>	51
3	<i>Drive/Operate: mobile and heavy equipment; controls</i>	51
4	<i>Manipulate: physically manage material processes</i>	51
5	<i>Tending: monitoring/adjusting gauges, switches, controls</i>	51
6	<i>Feeding/offbearing: manual labor timed by machines</i>	51
7	<i>Handling: basic, routine manual labor</i>	51
	Data: Priority and Preference of Mind Activity	60
0	<i>Synthesize: holistic, conceptual, strategic thinking</i>	60
1	<i>Coordinate: plan, implement, manage procedures</i>	60
2	<i>Analyze: investigate, research, experiment</i>	60
3	<i>Compile: gather, classify, store information</i>	60
4	<i>Compute: solve routine mathematical problems</i>	60
5	<i>Copy: duplicate, transcribe, record, send</i>	60
6	<i>Compare: recognize important factors for use</i>	60
	Reasoning: Mental Processes Required By Job	68
1	<i>Follow specific directions for basic, routine tasks</i>	68
2	<i>Methodical and thorough in routine procedures</i>	68
3	<i>Operational systems, procedures, maintenance</i>	68
4	<i>Solving on-going problems in familiar areas</i>	68
5	<i>Apply ideas and strategies to real problems/tasks</i>	68
6	<i>Holistic concepts, meanings, options, strategies</i>	68
	Mathematics: Math Function Required By Job	75
1	<i>Counting/Posting: inventory, data processing</i>	75
2	<i>Elemental: add, subtract, multiply, divide</i>	75
3	<i>Computational: solving routine math problems</i>	75
4	<i>Analytical, accounting, auditing use of math</i>	75
5	<i>Statistical, investigative mathematics</i>	75
6	<i>Research: innovative, experimental use of math</i>	75
	Language: Literary & Communicative Requirement	82
1	<i>Read, understand, follow basic instructions</i>	82
2	<i>Record, transmit, post, file information</i>	82
4	<i>Systematic, logical explanation and education</i>	82
6	<i>Creative literary, communicative ability</i>	82
◆	Educational Analysis	88
◆	NOTES	96

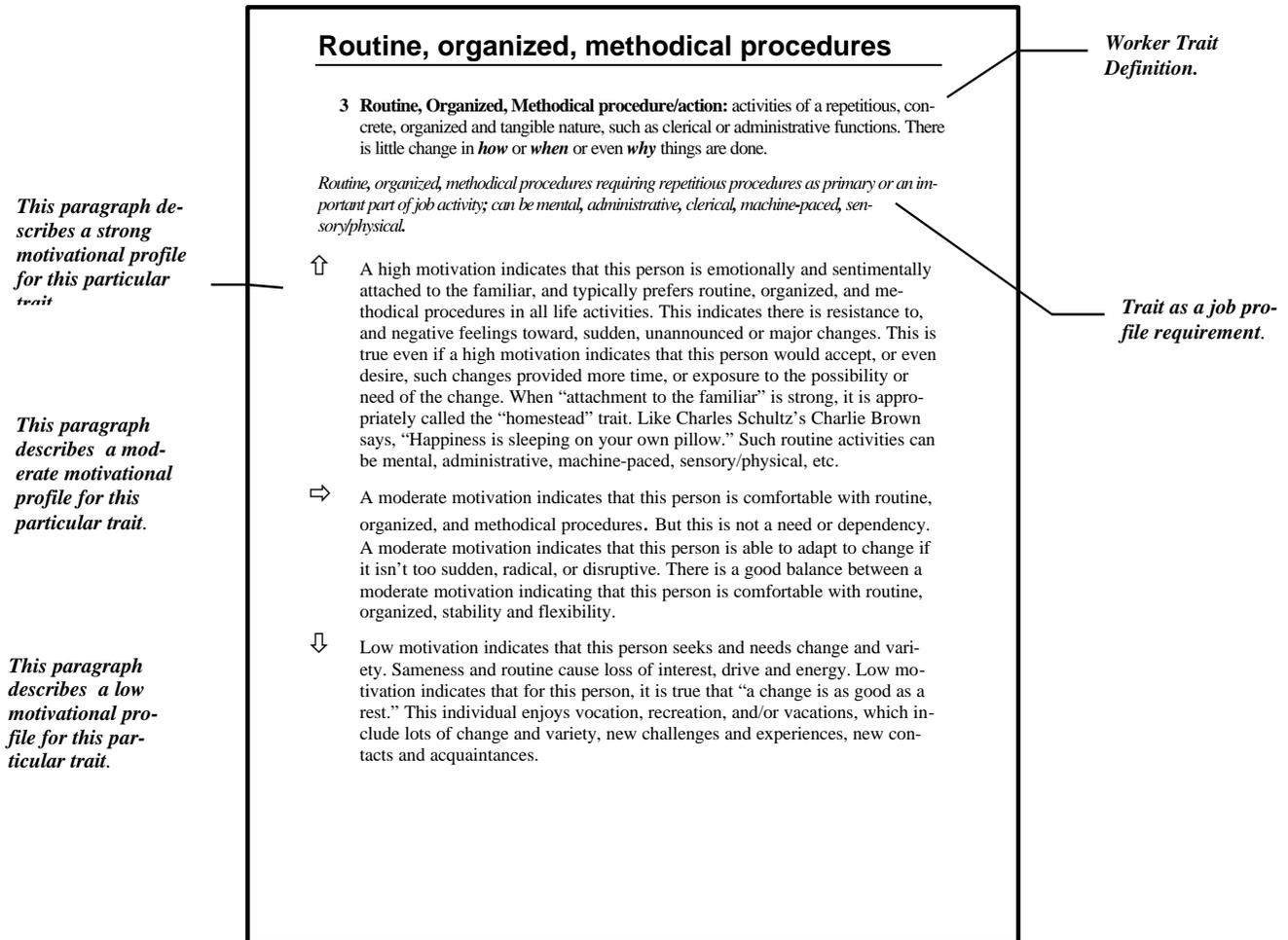
◆ Mapp Worker Trait Code System

The Worker Trait Code System has been in use for over 30 years and has proven to be an outstanding vocational tool for identifying jobs, classifying job requirements, and understanding human motivation. The Worker Trait Code System has been modified from a proposal by the US Department of Labor's 1965 version of the Dictionary of Occupational Titles. The Worker Trait Code has seventy-two factors sorted into nine categories. The code's purpose is to identify "those abilities, personal traits, and individual characteristics required of a worker in order to achieve successful job performance." The architect of MAPP used this same criteria to define job positions and provide a method for individuals to identify their motivations and to improve their odds at success in "worker trait" terms. The Worker Trait Codes of the Position Profile and the Personal Profile can be simply and electronically matched in order to ensure the right person is working in the right job.

The Worker Trait Code Report contains the scores 1-5 which determine the level of motivation the trait has for the person. Traits in Level 1 are compulsive; Level 2 is highly motivated; Level 3 is moderately motivated; Level 4 is unmotivated; Level 5 is an aversion.

◆ Technical Reference – Worker Trait Codes

Reference Format



The diagram above describes the format of the Worker Trait code definitions described in this chapter. It is provided as a detailed explanation and use of each of the 72 Worker Traits provided in the MAPP Vocational Appraisal.

Interest In Job Content

The Interest section identifies the ideal job content for this person by identifying the human talents, called Worker Traits, which he/she brings to the job. These talents are listed in their order of motivational priority and are central to the vocational potential of an individual. Typically, what one wants to do is that which he/she is most likely to do. If it is done often enough, (including training for it) the interest will turn into real skills, and then, he/she will stay on that job.

The 10 measured Worker Trait Codes are:

- 0 Output drive: production, goals, efficiency
- 1 Physical work with materials, tools, equipment
- 2 Direct business contact and interaction with others
- 3 Routine, organized, methodical procedures
- 4 Management of social or organizational activities
- 5 Work for personal gain, recognition, status
- 6 Concerned with people, communication of ideas
- 7 Technical, scientific interests and skills
- 8 Abstract, innovative, creative activities
- 9 Nonsocial procedures, operations or functions

Output drive: production, goals, efficiency

0 Output Drive: Production, Goals, Efficiency: inner personal drive to pass mileposts, reach goals, and tally results. This is particularly valuable where supervision is minimal, but results relative to time are important. Once a project is started, completion is a strong objective.

Output drive: production, goals, efficiency requiring emphasis on individual performance, results, output, goals, quality, schedules, deadlines, results, and profit. This activity requires individual responsibility, discipline, dedication and efficiency. It may be very important where supervision is minimal (i.e., is the person a self-starter). Persons in such activity often perform best when paid by contract, commission or piece-work.

- ↑ Once a high motivation indicates that this person has begun an activity, a priority (perhaps the highest) is to get it done, reach the goal, get a grade, produce a finished product, get the prize, etc. Self-satisfaction is tied directly to completed achievement. Pride is taken in setting the target, pace, and/or schedule for almost all activities. High motivation indicates that this person becomes frustrated, even stressed, when achievement is interrupted, terminated, rescheduled, or given a lower priority, thus delaying or preventing success in reaching the self-set or self-known goal. This is a major motivation or incentive common to self-employed persons, persons selling for commissions, and/or persons engaged in competitive activities.
- ⇒ A moderate motivation indicates that this person enjoys working at projects which are planned, scheduled, and completed. This indicates a preference to complete a project rather than leave it unfinished. But completion or achievement may be offset by switching to a project of higher priority and/or interest—with the hope that the uncompleted project may be done another day. What is not completed will probably be kept in mind until it is completed.
- ↓ Low motivation indicates that this person does not like the pressure of working under deadlines—and “deadline” is the word that comes to mind when this person thinks or hears of plans, schedules, assignments, objectives, and/or goals. Low motivation indicates that this person needs and values leisure, flexibility, and opportunity (sometimes insisting on the right) to set and work at a self-pace. If others try to push for faster performance from this person, it could have the effect of slowing down progress even further.

Physical work with materials, tools, equipment

1 Physical work with materials, tools, equipment: Work that is primarily sensory/physical, where the person is handling materials, tools, machines or equipment. It usually means working with tangible objects on a routine basis.

Physical work with materials, tools, equipment requiring craft activity; more sensory/physical than mental. Much or most of processing work fits this physical classification. So does machine and/or equipment operation.

- ↑ A high motivation indicates that this person has the interest and skill for physically working with things and objects. Work of this sort is more sensory and physical than mental. When working with machines or equipment, timing, dexterity, coordination and visual skills are important. Much of the activity is outdoors or where environmental conditions aren't well controlled to assure physical comfort. A high motivation indicates that this person relies on the natural talent, which has been developed since birth, for the ability and savvy to do such work.
- ⇒ A moderate motivation indicates that this person has the aptitude for physically working with things and objects. But that activity is probably secondary to more important activity, or as a minor part of it—such as operating a vehicle as a part of your work. It is an asset to be handy with one's physical talents, tools, appliances, etc.
- ↓ Low motivation indicates that this person has little interest in physically working with things and objects as a primary or important part of work or recreation. Other activities carry a higher priority. Sensory/physical talents have probably not been developed to skill levels.

Direct business contact and interaction with people

2 Direct business contact and interaction with others: ‘Being with’ people means gregarious association with others as an important part of vocational activity. It is assumed that additional activities are involved, such as communication, leadership, service, etc.; nothing in this worker trait gives a clue about added activity. By itself, it **only** means gregarious contact and association.

Direct business contact and interaction with people requiring vocational involvement and interaction with people; organizational teamwork and cooperation; enough contact, connection, sequential order or overlap of job activities to cause work linkage between persons.

- ↑ A high motivation indicates that this person seeks association with others socially, organizationally, and recreationally. In addition to assuring company with others, association is an important arena and environment for interacting with people in a variety of ways: leadership, managing, supervising, communicating, serving, caring, etc. Other traits have to be considered to determine **how** and **why** a high motivation indicates that this person associates and interacts with others.
- ⇒ A moderate motivation indicates that this person enjoys associating and interacting with people, but likes independence as well. So the activity, rather than people per se, is the deciding factor. Where mutual interest is the purpose for association, a moderate motivation indicates that this person willingly participates and cooperates. Where interests differ, a moderate motivation indicates that this person will independently pursue those interests.
- ↓ Low motivation indicates that this person shows little priority for associating with others in vocational or recreational activities. There may be a variety of reasons: nongregarious and nonbenevolent interests that involve activities unrelated to people may have a strong influence. Review of other traits may help identify why there is little motivation toward contact and interaction with others.

Routine, organized, methodical procedures

3 Routine, Organized, Methodical procedure/action: activities of a repetitious, concrete, organized and tangible nature, such as clerical or administrative functions. There is little change in *how* or *when* or even *why* things are done.

Routine, organized, methodical procedures requiring repetitious procedures as primary or important a part of job activity; can be mental, administrative, clerical, machine-paced, sensory/physical.

- ↑ A high motivation indicates that this person is emotionally and sentimentally attached to the familiar, and typically prefers routine, organized, and methodical procedures in all life activities. This indicates a resistance to, and negative feelings toward, sudden, unannounced or major changes. This is true even if a high motivation indicates that this person would accept, or even desire, such changes provided more time, or exposure to the possibility or need of the change.
- ⇒ A moderate motivation indicates that this person is comfortable with routine, organized, and methodical procedures. But this is not a need or dependency. A moderate motivation indicates that this person is able to adapt to change if it isn't too sudden, radical, or disruptive. There is a good balance between stability and flexibility.
- ↓ Low motivation indicates that this person seeks and needs change and variety. Sameness and routine cause loss of interest, drive and energy. Low motivation also indicates that to this person, it is true that a change is as good as a rest. This individual enjoys vocation, recreation, and/or vacations, which include lots of change and variety, new challenges and experiences, new contacts and acquaintances.

Management of social or organizational activities

4 Management of Social or Organizational Activities: a service leadership intended to cause beneficial results for people. Emphasis of this factor is on people, serving their interest in a leadership, communicative role.

Management of social or organizational activities requiring responsibility for organizational roles, duties, interaction, attitudes, morale, performance and achievement of people; social and psychological emphasis in the management of roles and activities of people.

↑ A high motivation indicates that this person is motivated to manage people and their activities. Such management can be exercised with a variety of talents, and a variety of reasons. The primary reasons are:

- (1) to exercise executive, managerial, or supervisory responsibility and authority,
- (2) to have the management position, role and recognition,
- (3) to not be in a subordinate, supervised position or role.

Because emphasis is on the management of people, this is seen by this person as a service role where the managing is in the interest of those being managed. Whether a high motivation indicates that this person is motivated and equipped to manage on a take charge or given charge basis (an important difference) can be determined by the motivational strength and involvement of other traits such as persuasive, benevolent, need of harmony, etc.

⇒ A moderate motivation indicates that this person is moderately motivated to manage others on a social or organizational basis as a part of the overall vocational responsibilities and activities. Rather than functioning in the top executive or managerial position or role, a moderate motivation indicates that this person is probably more comfortable with a position in middle management or as group or team leader. Reasons and/or talent for such management role and responsibility can be identified by motivational levels of related traits.

↓ Low motivation indicates that this person does not want the responsibility for managing other people, preferring to function under the management of others, or involvement in work completely independent of an organizational relationship with others. If persons do not want to manage others, it should not be assumed that they also want to be managed by someone else. It is important to look at other traits to see if low motivation indicates that this person requires or prefers a subordinate role, managed by others, or is equipped to function independently.

Work for personal gain, recognition, status

5 Work for Personal Gain, Recognition, Status: preference for activity resulting in prestige, status, recognition, or reward relative to others. This can be a positive vocational factor where drive to achieve goals is the means to get recognition. It is detrimental if need of recognition is high but will or talent to achieve such recognition is low.

Work for personal gain, recognition, status requiring self-drive to publicly exercise personal skills in order to get positive recognition from others. This is a primary trait for many persons in sales activities. Recognition can be given by praise, applause, social status or titles, achievement awards, promotions, incentive or performance compensation, or working on a commission basis. In moderation, this is an asset because it suggests confidence, goal orientation, competitiveness, and take charge drive. In excess, it means vanity, self-centeredness, and fear of risk because of possible loss of status, money, recognition, etc.

- ↑ A high motivation indicates that this person strives to assertively or aggressively gain personal recognition, status, prestige, and worth in the process of social, organizational, and/or vocational interaction with others. High motivation indicates that this person looks for opportunity, challenge, and risk, if and when odds are strongly favorable. But this person will avoid opportunity, challenge, or risk if they might result in loss of status, role, or ownership. In many vocational activities, recognition is a primary motivator and therefore an important asset.
- ⇒ A moderate motivation indicates that this person enjoys being in the limelight when recognition is earned, deserved, or given. However, there is no ego trip involved in the effort. A moderate motivation indicates that this person can comfortably function in the foreground or the background. Nonetheless, recognition is an energizing vocational factor.
- ↓ Low motivation indicates that this person has little or no need for recognition, status, or competitive gain. Comfortable and satisfied with a subjective estimate of self in relation to others, opinions others hold about this person do not present serious effects, one way or the other. Performance is motivated by personal and internal interests or drive, not by the promise of favor, recognition, or reward from external sources.

Concerned with people, communication of ideas

6 Concerned With People, Communication of Ideas: mind-oriented on a holistic, conceptual basis; philosophical interest in, and awareness of people accompanied by motivation to cause good, growth, and gain in their lives; good ability to put thoughts into words.

Concerned with people, communication of ideas requiring influential leadership role related to development, good, growth, gain, and destiny of people; responsibility for influencing and leading relative to strategic objectives for activities of people. This is a high calling service orientation and activity which involves ethics, social concern and responsibility. Influential, in this context, does not necessarily mean persuasion, selling or negotiating; nor does leadership necessarily mean managing or supervising.

- ↑ A high motivation indicates that this person is conscious of existence, meaning, purpose, potential, and destiny of humankind, people, and self. High motivation indicates that this person is motivated by a self-felt, self-accepted calling to the cause of good, growth, and gain in the lives of others. Influential communication of ideas is a primary way of achieving those objectives. Perception and thinking tend to be holistic and conceptual; i.e., seeing the big picture. It is important to see which of the other traits are interactive with this trait, because there can be many interesting combinations. This is a major trait in cultural, intellectual, academic, and creative activities. It includes ideas, concepts, theories, ethics, and values.
- ⇒ A moderate motivation indicates that this person is interested in ideas, concepts, and meaning as a part of perceptual and mental activities. Intellectual, theoretical, and/or creative activities are balanced with other activities and do not have a priority or emphasis.
- ↓ Low motivation indicates that this person is much more at home with fact, knowledge and familiar experience than with abstract ideas, theories, hypothesis, open-ended options, and/or fiction. Low motivation indicates that this person tends to relate to people on the basis of types rather than looking for uniqueness in each person. It is important to this person to know that things (including people) can be counted on to be what they appear to be, on the basis of first or early impressions.

Technical, scientific interests and skills

- 7 Technical, Scientific interests and skills:** curious about the nature, function, and utility of things; inclined to inquire, explore, experiment; methodical and procedural; systematic in search for insight, information, solutions.

Technical, scientific interests and skills requiring functional curiosity, inquiry, exploration, innovation, design, and application relative to new possibilities and options in the use of tools, procedures, systems, machines, equipment, or scientific principles and methods. It is based on systematic search for new possibilities, options, resources, methods, and/or systems to make progress or solve existing problems.

- ↑ A high motivation indicates that this person has natural savvy and curiosity about the nature of things, and about what makes things tick, and possesses a mind which is inquisitive, exploratory, analytical, and experimental. **Technical** orientation is often the interaction of two or more of these traits: **scientific, natural/outdoor, mechanical, and managerial**. It is important to identify the other traits involved to determine whether a high motivation indicates that this person is more technical, scientific or systems-oriented, or if these talents are balanced.
- ⇒ A moderate motivation indicates that this person has a curiosity and awareness about the nature and utility of things. Analysis and experimentation are a part of vocational and recreational activities. But those are probably not specialized or professional activities. Instead, they are a part of a mix of functional talents. This technical orientation causes this person to think systematically, and want to have some developmental or experimental challenge in activities.
- ↓ Low motivation indicates that this person is not interested in scientific research of a technical nature; or in technical systems, equipment, programs or activities. That strongly suggests that trait combinations and/or trait motivations for scientific and/or technical activities (e.g., **scientific, natural/outdoor, mechanical, mathematical, and/or managerial**) are not vocationally important. Scientific and/or technical activities are called “Classic” by Robert Persig. The opposite orientation is called “Romantic” and tends toward social and cultural emphasis.

Abstract, innovative, creative activities

8 Abstract, Innovative, Creative Activities: brainstorming orientation in which ideas trigger more ideas; mind inclined toward ideas, concepts, hypothesis, theories, options, and strategies; intuitive, and creative.

Abstract, innovative, creative activities requiring brainstorming activity where ideas trigger new ideas. This relies on spontaneous intuition, imagination and creativity. It requires mental activity oriented toward abstract, theory, fantasy, symbolism, hypothesis, essence, and aesthetics.

- ↑ A high motivation indicates that this person is perceptually, subconsciously, and consciously aware of fantasy, symbols, and symbolic relationships, abstract ideas, options, and choice of options as they relate to creative or innovative activities. Perception triggers ideas in this person's mind, a process which just happens—a process often called intuition.
- ⇒ Along with other mental activities, a moderate motivation indicates that this person is aware of abstract ideas and concepts. Ideas about new or different ways of doing things is commonly called innovating or inventing. Rather than creating in ways unrelated to present or past activity, a moderate motivation indicates that this person uses an abstract, innovative, and/or creative aptitude, to extend or expand what already exists.
- ↓ Low motivation indicates that this person's mind is oriented toward fact, reality, and tangible processes. Perceptions, thinking, and expression are not related to intangibles, abstract ideas, theories, fiction, hypothesis, etc. Instead, logical, analytical, computational, administrative, clerical, operational, and/or sensory/physical activities fit this person's talent.

Non-social procedures, operations or functions

9 Nonsocial Processes, Operations, or functions: preference for or comfort with activities that are done apart from, or independent of, people. Because many of the activities are most efficiently done if not interrupted by social contact or activity, this can be a valuable factor in productivity, efficiency, quality, concentration and dedication. This is often related to the worker traits called “Physical Work With Materials, Tools, Equipment” or “Technical, Scientific Interests and Skills.”

Non-social procedures, operations or functions requiring work activity which is independent of, or apart from people—such as technical, mechanical, procedural, agricultural or outdoor work. It often requires self-sufficiency and responsibility for one’s own performance.

- ↑ A high motivation indicates that this person is socially independent. This allows, often encourages, activities which do not require, permit, or encourage association or interaction with others during projects and shifts, for extended periods of time. Emphasis is not on *what* this person is doing, but that it is willingly or intentionally apart from others. This trait, by itself, does not imply or suggest anti-social or selfish attitudes. It *only* identifies social independence for vocational or recreational activities. Scientists, engineers, persons engaged in agricultural vocations, and night-shift service workers often rate in this factor.
- ⇒ A moderate motivation indicates that this person enjoys social or vocational interaction with others, but is not dependent on direct contact and association. If some work responsibilities or activities require functioning apart from others, it can be done without the need of social breaks to be with others. This flexibility is an asset in trade activities, operating machines or equipment, and in many technical and outdoor activities.
- ↓ Low motivation indicates that this person needs to be with people and will avoid activities which are done apart from others. Low motivation indicates that this person considers one-among-others togetherness as an essential environment for personal, work, and/or recreational activities.

Temperament For The Job

This *Temperament* section identifies the *Motivation* and *Talent* an individual possesses, and utilizes, to accomplish what the above *Interest* section says he/she wants to do. Therefore, these two sections should confirm each other. They are supposed to say the same thing from a different perspective. Here too, factors with high ratings simply identify who the individual is, and the talent he/she brings to a job.

The 12 measured Worker Trait Codes are:

0	Evaluation: logical study, analysis	1
1	Change and variety: accept, utilize, cause change	3
2	Routine activity set by schedule or operations	3
3	Work under management or supervision by others	3
4	Plan, control, direct activities of others	3
5	Organizational involvement, teamwork, roles	2
6	Independent, self-planned, self-performed activity	2
7	Aggressively influence, persuade, get agreement	4
8	Handle responsibilities, choices, decisions	1
9	Intuition, creativity: ideas, concepts, options	1
X	Provide service dedicated to interest of others	1
Y	Work with detail, data, records, inventory	1

Evaluation; logical study, analysis

0 Evaluation: Logical Study, Analysis: tangible problem solving; weighing information against measurable or verifiable criteria; conscious, intentional, procedural, factual activity with the mind which arrive at generalizations, judgments, decisions, or solutions.

Evaluation; logical study, analysis requiring mentally weighing relevant information, numbers, or data relative to measurable or verifiable criteria; conscious, intentional, methodical, systematic, procedural thinking.

- ↑ **Evaluation: to appraise carefully; to judge as to worth or amount; to estimate generally.** A high motivation indicates that this person has a logical mind which makes sense of what is perceived regarding the big picture and pieces of the picture—but in the context of that big picture. It is evaluation or assessment **after** perception, not the process of perception itself. Emphasis is on patterns, linkage, and relationships. Intuition may be involved in conjunction with this evaluation/assessment process.
- ⇒ A moderate motivation indicates that this person is logical and analytical, striving to make sense of perceptions by identifying how things logically fit together. This talent fits well with scientific, research, management, literary, and/or computational activities. It functions in a conceptual context. See factors in the **data** and **reason** sections of the Worker Trait Code System to know how evaluation relates to other mental processes.
- ↓ Low motivation indicates that this person is oriented toward what is tangible, factual and functional, where logic is based on **utility**: what is it? how do I use it? what can I do with it? Logic is used to figure things out, often by trial and error in actual practice. Learning is achieved best by apprenticeship. Problem solving relies heavily on this person’s past experience.

Change and variety

1 Change and Variety: Accept, Utilize, Cause Change: ability to seek and capitalize on change or variety; preference for a variety of activities and/or environments instead of steady ones.

Change and variety requiring progression of work activities characterized by frequent changes in location, function, or environment. Requires motivation, ability, flexibility, and/or willingness to not only accept change, but to prefer and thrive on change. This often includes or assumes that the job does not have repetition or sameness—and maybe not permanence. It does include mobility and flexibility.

- ↑ A high motivation indicates that this person seeks and needs change and variety. Change is motivating, stimulating, and energizing. This person looks for new options, challenges, assignments, acquaintances, relationships—even new careers in new places. A high motivation indicates that this person tires of sameness, repetition and routine—even in activities which were interesting at the start. Once things become routine, it is time to move on to more interesting things.
- ⇒ A moderate motivation indicates that this person readily adapts to change and may even be stimulated by it. Change is not so important that it forces termination or interruption of more routine activities engaged in. It is beneficial for some change, variety or developmental progress to be in this person’s work and/or recreation. But it should not be unexpected, abrupt or radical change.
- ↓ Low motivation indicates that this person is very attached to the familiar and simultaneously quite resistant to change. This is a **homestead orientation** where this person becomes sentimentally and emotionally attached to familiar surroundings, things, activities, habits, acquaintances, and relationships. Sudden, unexpected, or large changes cause instant negative reaction and stress—even where the change would be desired and sought by this person, if acquainted with the possibility, and enough time was allowed to adjust to the idea.

Routine activity set by schedule or operations

2 Routine Activity Set by Schedule or Operations: repetitive or short-cycle activities dictated and timed according to set procedures or sequences. Such work is often governed and timed by machine input or output.

Routine activity set by schedule or operations requiring repetitive or cyclical activities set and governed by sequential procedures, operational systems or machine processes. Timing and flow are often set by machine input or output. Work is steady and requires concentration. It is relieved by scheduled breaks.

- ↑ A high motivation indicates that this person has motivation and talent for assembly line type of activity, i.e., to be in routine activity which is tied to, and timed by machines. Such work can be feeding materials into machines, handling material coming from a machine, or performing repetitious functions at a position along an assembly line process. The work is usually sensory/physical. The work is steady except for scheduled breaks.
- ⇒ A moderate motivation indicates that this person is tolerant of routine sensory/physical activity which is tied to, and timed by machine operation. It usually involves repetitious processes with occasional scheduled breaks. With only medium motivation for assembly line type of work, it is likely that feeding, offbearing or assembly work is a temporary activity until something more interesting is found, or it is a minor part of the assigned work.
- ↓ Low motivation indicates that this person does not like being tied to or tied down by timed, repetitious sensory/physical activity. Such work quickly becomes boring, frustrating and stressful. If given such work, low motivation indicates that this person seeks and needs frequent breaks and other change and/or variety. Performance and quality of work tend to fade as repetitive activity continues.

Work under management or supervision by others

3 Work Under Management or Supervision by Others: working role and activities which are planned, directed, supervised, and monitored by someone higher with management responsibility and authority. Such role and activity allow little or no room for independent action or judgment to choose what to do or how to do it.

Supervised activity directed by others requiring activity determined, scheduled, assigned, supervised and monitored by others; works well in a subordinate position and role; little or no need for independent judgment, decisions, or actions.

- ↑ A high motivation indicates that this person has a strong preference to work under the management or supervision of others who are competent and knowledgeable in their area of expertise. This also may indicate a preference to avoid work of an independent nature (i.e. self-directed, self-planned, self-managed). Performance, morale, energy, enthusiasm, and quality of work tend to reflect how satisfied this person is with the working environment as created and managed by the motivational and inspirational leadership of a manager, director, supervisor, or lead-person.
- ⇒ A moderate motivation indicates that this person has a moderate preference to work under the competent leadership of others, work closely with peers, or function independently. It is valuable to identify which social environment may be best suited for this person, but the work role in itself, is not a decisive factor.
- ↓ Low motivation indicates that this person does not particularly like or need to be managed by others. It is important to study related Worker Traits to determine whether low motivation indicates that this person is motivated to manage, influence, persuade, or work independently. Persons who don't wish to be managed sometimes do not perform or adjust well when closely monitored or supervised. They resent being dominated, managed, or controlled by others.

Plan, control, direct activities of others

4 Plan, Control, Direct Activities of Others: “organize work and direct its completion through the services of others; prime responsibility for developing the will to work in the employees, thereby motivating them to a higher level of attainment; ability to translate plans and policies into effective production or attainment of established objectives; know what is to be done and how to do it; relay instructions to subordinates so as to complete the demands effectively.”—The Management Dictionary

Plan, control, direct activities of others, required to organize work and direct its completion through supervised activity of others; responsibility to cause or motivate the will to work by others; responsibility for work performance and results by others; translate plans and policies into effective production or attainment of established objectives.

- ↑ A high motivation indicates that this person seeks organizational management responsibility and role. Emphasis is on firm, take charge management to get things done through utilizing the talents of others. Skills are primary. A high motivation indicates that this person is not interested in the activity in order to socialize, empathize, sympathize, or manage on a psychological, personality, emotional, or ego basis. It is management with balance between the big picture and pieces of the picture. This management is fairly administered, as long as performance, quality, and results are the measuring criteria.
- ⇒ A moderate motivation indicates that this person accepts and exercises both responsibility and role for organizational management. Emphasis is on management of people, but that is directly tied to performance of existing, available skills. Performance and results are the main emphasis. Other Worker Traits must be studied to determine if this person manages best on a take charge or given charge basis—which has much to do with how personally or impersonally, performance-based or service-based, that management style will be.
- ↓ Low motivation indicates that this person does not desire responsibility for organizational, operational, or administrative management.

Organizational involvement, teamwork, roles

5 Organizational Involvement, Teamwork, Roles: integrated vocational involvement and association with others with motivation to work together to achieve group objectives; teamwork cooperation and coordination; integrate one's activities with those of others on a sustained, harmonious, productive basis.

Organizational involvement, teamwork, roles requiring willingness, and talent to integrate one's temperament and activities with those of others on a sustained, cooperative, harmonious, productive teamwork basis. This includes interaction, inter-dependence, coordination, and integration.

- ↑ A high motivation indicates that this person is strongly motivated to be organizationally active with others. Traits which may be included are: **gregarious**, **managerial**, **benevolent**, **persuasive**, and/or **philosophical**. Because so many traits **could** be involved in this rating, and probably are, it is important to read appraisal data to know the motivational levels for each of those traits. Depending on the traits involved, and motivation for each, the full definition of this factor can have a variety of meanings. It probably represents a service activity with organizational loyalty, intentional cooperation with others, and efforts in behalf of others. A high motivation indicates that this person senses and accepts a certain degree of self-assumed responsibility for the good, growth, and gain of others.
- ⇒ A moderate motivation indicates that this person enjoys, and benefits from, being organizationally interactive with others in work or recreational activities. This is attraction toward association and service. A moderate motivation indicates that this person also has considerable social independence. Organizational association with others tends to be on a mutual-interest or mutual-activity basis. If work requires functioning independently of, or apart from others, this person is comfortable with occasional non-social activities.
- ↓ Low motivation indicates that this person prefers independence from social, vocational, and recreational involvement with others. First priority is given to self and self-interest—with little motivation for organizational involvement, service, teamwork, loyalty, etc. This trait is an asset for work which has little or no direct contact or interaction with others and requires individual initiative and social independence or isolation.

Independent, self-planned, self-performed activity

6 Independent, Self-Planned, Self-Performed Activities: working alone and apart in physical isolation from others, even though the activity might be integrated with the work of others in some other way (like an airplane pilot and a person in an airport control tower). Just as important, this Worker trait includes self-sufficiency, self-drive, self-achievement, and enough talent to successfully perform without help.

Independent, self-planned, self-performed activity requiring self-motivated, self-determined and/or self-sufficient activities; working alone or apart from others; relying on individual responsibility and discretion. This does not require, suggest or imply egocentricity, selfishness or anti-social orientation.

- ↑ A high motivation indicates that this person is talented, self-sufficient and goal oriented, demonstrating independence in two ways: (1) motivated to manage own operational, technical, professional, scientific, and/or administrative activities without management or involvement by others; or (2) impersonally but objectively, manage the skills of others as utility in the process of getting things done. The prime motivation is to utilize what is at hand to accomplish vocational objectives. That could be done exclusively with one’s own talents, or it could include applying the talents of others. If it includes management of people, they are expected, perhaps even required, to perform at quality skill levels. Personality and psychology are not included. A high motivation indicates that this person does not want to be managed or dominated by others, or to rigidly conform to organization rules or expectations.
- ⇒ A moderate motivation indicates that this person is talented, self-sufficient, and goal-oriented. Work activity and goals are more important than association, interaction or involvement with people. If vocation calls for working with others, or managing the skills of others as a part of achieving work objectives, this person is motivated and equipped to do that. Others are selected for existing, deliverable skills and then performance is expected. But independent, self-directed, self-achieved activity is preferred.
- ↓ Low motivation indicates that this person functions best in a given, known, managed and supported organizational position and role in which to functionally serve the interests of the organization. This is an involved service role.

Aggressively influence, persuade, get agreement

- 7 Aggressively Influence, Persuade, Get Agreement:** individual drive, initiative and assertion to: (a) have direct access to and make direct contact with the listener, (b) communicate directly with the listener, (c) cause the listener to hear, understand, accept (willingly or otherwise) what is being said, and (d) motivate the listener to act on what was said.

Aggressively influence, persuade, get agreement required to intentionally, assertively, effectively influence the wills, thinking, opinions, attitudes, choices, or activities of others with a pre-determined objective in mind; a sales activity which includes cold calls and closings related to time and objectives; personal ability to dominate, even intimidate, in one's communicative interaction with others; often includes earning income on a contract, incentive or commission basis.



A high motivation indicates that this person is strongly motivated to:

- (1) have direct access to the listener
- (2) intentionally, assertively (maybe aggressively), orally communicate to the listener
- (3) cause the listener to hear and understand what is said
- (4) cause the listener to willingly or otherwise accept what was said, and
- (5) cause the listener to act on what was said if that was the intent.

Persuasion suggests confrontation of wills and may include intimidation—intentional or otherwise, overt or covert. It is important to look at many other Worker Trait Code factors to identify the motivation, purpose, style, and objective of this persuasive trait. A high motivation indicates that this person is going to persuade; the only questions are: **when, how** and **why**?



A moderate motivation indicates that this person is motivated to influence and convince others as a part of social, organizational, vocational, or recreational activities. A motivation exists to speak up when there is reason, occasion, or opportunity to sway others to this person's ideas or way of thinking. Persuasive efforts may be oral, written, or via some media (like computer network hookups). Motivation behind that persuasion is to get others to accept what one is communicating. The objective of the communicative content can only be known by looking at many other Worker Trait factors and the list of personal traits.



Low motivation indicates that this person is not motivated or equipped to persuade; instead demonstrates an inclination to be psychologically intimidated by persons who are highly persuasive. Intimidation is not necessarily an overt act, but it always generates an aura which most everyone quickly senses, feels, respects, or despises and typically responds to. Intimidators seemingly are ignorant about intimidation because they exercise it as a normal expression, but are not particularly affected by it. Those intimidated know all about intimidation because they are on the receiving end of it. Intimidation and its psychological effects remain a mystery to intimidators, because those intimidated are not persuasively equipped to tell intimidators what they are doing. There are other forms of intimidation beside persuasion which may be functioning at the same time; i.e. those susceptible to psychological intimidation can simultaneously be intimidators in other ways.

Handle responsibilities, choices, decisions

8 Handle Responsibilities, Choices, Decisions: accept, assume, handle, and/or be accountable for individual responsibilities, choices, decisions and options. Psychologically, this includes both initiative and coping. It might or it might not mean or suggest management responsibilities. It does mean a person can be counted on for some individual responsibility or duty.

Handle responsibilities, choices, decisions requiring willing acceptance of responsibility, and exercise authority or authorization for thinking, decisions, and action when confronted with important, critical, or unexpected situations with minimum stress or reaction; see and think holistically, conceptually and strategically. This may indicate a take charge or given charge management orientation. It may be a philosophical ability to have new ideas and make important decisions. It may be technical engineering or systems capability.

- ↑ A high motivation indicates that this person subjectively exercises responsibility for social, vocational, or recreational perceptions, thinking, options, choices, decisions, and actions. This is a broad scoped, important, in-depth factor which includes social, leadership, management, and mental activities. Responsibilities which fit this person's orientation are identified by many Worker Trait Code factors. There is a great variety of possibilities, so no assumptions should be made until all Worker Trait Code sections are reviewed. The purpose of this factor is to emphasize that a high motivation indicates that this person accepts, assumes, and acts responsibly (and probably assertively) relative to the exercise of talents—and those talents might apply to various forms of leadership. Perception, thinking, and action tend to be in the context of the big picture. Thinking is holistic, conceptual, exploratory, and analytical.
- ⇒ A moderate motivation indicates that this person willingly accepts responsibility for exercising motivated talents. These may include leadership and/or management talents and, therefore, involve responsibilities for others. This is an important, broad, in-depth factor which includes social, leadership, management and mental activities. As this person's appraisal is read, it is important to identify specific talents which should underlie vocational responsibilities. Perception and thinking include seeing the big picture and handling responsibilities in that context.
- ↓ Low motivation indicates that this person does not want primary responsibility for exercising options, decisions, and actions relative to future possibilities and choices. Personal awareness, activities, roles, and relationships are based on current knowledge, experience, and/or relationships. Abstract, theoretical, hypothetical, and intangible matters are not a part of every-day perceptions and thinking.

Intuition, creativity; ideas, concepts, options

9 Intuition, Creativity: Ideas, Concepts, Options: insight, imagination, creative perception or awareness, savvy on subconscious as well as conscious levels; reliance on subconscious ability to absorb essential information, mull it over, and come up with ideas, theories, concepts, symbols, patterns, interpretations, options, strategies, etc.

Intuition, creativity; ideas, concepts, options requiring intuitive sensing, perception or savvy on subconscious as well as conscious levels; reliance on subconscious talent and processes to absorb essential information (essence), mull it over and expect spontaneous ideas, concepts, options, strategies, symbols, patterns, etc. This is called “intuition.”

- ↑ Mind and mental activity are very central to this person’s vocational activities. ***Intuition is very different from thought, from feeling and from sensation, by the major characteristic of insight. Intuition comes from the Latin meaning, literally, in to you. Intuitive insight results from identification with rather than looking at the object of attention. It is being a part of. Intuiting is a process, not of perception, but of experience.*** A high motivation indicates that this person has talent for experiencing abstract ideas, creativity, concepts, theory, assessment and choice of options. New ideas and creativity must have an important place in vocation.
- ⇒ A moderate motivation indicates that this person is open-minded, curious, creative, and innovative, having new ideas and concepts, and preference to be involved in creative or developmental activities. This is a complementary talent rather than major drive or specialization. It is, therefore, important to determine how it fits in with other mental and functional talents.
- ↓ Perception, thinking, logic, decisions, and actions of this person are based in fact, resulting from personal experience. Experience is the process for learning, development, turning talents into skills, and functioning in vocational activities. Low motivation indicates that this person is not oriented toward fantasy, abstract ideas, creativity, theory, hypothesis, research, or experimentation.

X. Provide service dedicated to interest of others

X Provide Service Dedicated to Interest of Others: this Worker trait primarily measures benevolence: sacrificial giving of self in the interest of others. But it includes philosophical and social factors as well. It means empathetic, sympathetic, benevolent, social, or organizational involvement in the lives of others on a service basis.

Provide service dedicated to interest of others requiring empathetic, sympathetic, personal involvement in the lives of others relative to hurts, pains, needs, and wishes of others; willing, intentional, benevolent giving of self in the interest of others. Benevolence of the heart with personal satisfaction coming directly from helping others.

- ↑ A high motivation indicates that this person is benevolent—to voluntarily give of self to help others, especially regarding current pain, hurts, stress, needs, and problems. This means empathetic, sympathetic, intentional, personal involvement in the personal lives of others to give help, sacrificially if necessary—and to subjectively gain personal satisfaction from providing personal service. Please note emphasis on the word **personal**. This is a heart trait, and is totally self-motivated and voluntary. It is one of the most strongly motivated traits in determining vocational dedication. The word “others” is important in the context of benevolence: a high motivation indicates that this person is **more** benevolent toward persons not intimately, formally, or organizationally related. Benevolence expects those in close relationship to join in the giving rather than being a priority recipient. Nonetheless, this person is benevolent toward all persons. But benevolence does have priorities about eligibility of persons for help. Motivation for this trait is compounded if functioning interactively with a strongly motivated **philosophical** trait.
- ⇒ A moderate motivation indicates that this person is naturally empathetic, sympathetic, generous, and helpful. This person is always ready to offer a helping hand to others. If benevolence is to be a part of vocational or volunteer activities, it is important to identify how it best functions with other Worker Traits. A moderate motivation indicates that this person is generous and helpful relative to current hurts, needs, problems, and wishes of others, particularly those who are in direct contact.
- ↓ Low motivation indicates that this person is conscious of self—what is going **for** and **against** self, and how it adds up; with pleasure, enthusiasm, and energy when things are going for this person; with frustration, disappointment, maybe stress, and disillusionment when things are going against this person. Self-interest typically comes first.

Y. Work with detail, data, records, inventory

Y Work With Detail, Data, Records, Inventory: natural, motivated perception, retention and recall of detail on a sustained, logical basis; awareness and retention of specific information and ability to classify it or relate it to other similar things.

Work with detail, data, records, inventory requiring sustained perception, retention and recall of detail relative to clerical, administrative, computational, technical, systematic, operational and/or mechanical activities. (This trait should not be given importance apart from other complementary factors. Low perception of detail per se may be an asset if other traits cause good perception of essential detail and simultaneously discard trivial detail.)

- ↑ A high motivation indicates that this person has excellent perception, retention and literal recall of detail per se. This is a valuable talent in clerical, computational, administrative, literary, technical, operational, supervisory, and/or managerial activities. It has less vocational importance if some usually-related traits are not equally motivated. It is therefore important to study all Worker Trait factors to see how this talent fits with, or complements related talents. (**note:** this awareness of detail per se may be accompanied by “awareness of *essential* detail” which is related to essence rather than to fact or data. See factor “*intuition: ideas, concepts, creativity, options*” in the *factors* report, under Temperament for the Job.)
- ⇒ A moderate motivation indicates that this person has good ability to remember, find and use exact detail. This is a very useful talent in conjunction in clerical, computational, administrative, literary, technical, operational, supervisory and/or managerial activities.
- ↓ Low motivation indicates that this person does not see, retain and/or recall verbatim detail and, instead, shows an awareness of concepts, patterns, general ideas, etc. This person “gets the drift” of what is seen, read or heard. Recall is in general and relativistic terms and not in specifics. Numbers are sometimes transposed. Words are read as form or pattern rather than by specific letters.

Aptitude: Mental, Perceptual, Sensory/Physical

This is a highly generalized section in which the narrative deliberately focuses on talents, without emphasis or even mention of *where* or *how* these talents should or might be applied. It lets individuals look into a mirror and see his/her own talents—and then decide for themselves where they fit and function the best. It is another context in which to see if priorities are mental, sensory or physical.

This section emphasizes linkage between mind, senses and body. Factors in this aptitude section identify how the person is wired for mental/sensory/physical activity. In many activities, there is very close linkage between mental, sensory, and physical activities. Where that occurs, it is usually the subconscious mind that triggers, controls, and activates sensory/physical activity.

The 11 measured Worker Trait Codes are:

C	See and sense colors, shades, patterns, textures	1
E	Simultaneous skills in complex physical tasks	1
F	Mental/Sensory skills in handling fine detail	1
G	Intellectual and/or Analytical orientation	1
K	Mental/Sensory coordination of physical action	1
M	Manual dexterity in routine “workbench” activities	1
N	Computational or analytical use of numbers	2
P	Sensory/Mental awareness of “pieces of the picture”	1
Q	Sensory/Mental awareness of detail per se	1
S	Mental/Sensory awareness of “the big picture”	1
V	Literary and/or Communicative orientation	1

C. See & sense colors, shades, patterns, textures

C See and Sense Colors, Shades, Patterns, Texture: awareness, perception and expression regarding aesthetics, beauty, color, and spatial measure: size, shape, distance, dimension, perspective, etc. Such awareness and talent can be sensory/physical, psychological, and/or philosophical.

See and sense colors, shades, patterns, textures requiring the ability to perceive, recognize or discern colors, shades, patterns, textures and differences thereof; also recognize harmonious or contrasting color combinations; match colors accurately; good perception of spatial measure—size, shape, distance, dimension, perspective, relationship. It is either an asset or necessity to sense, understand, or know the psychological and philosophical meaning of colors, patterns, textures, etc. in their symbolic context.

- ↑ At its highest development and talent, this trait means sensing and seeing aesthetics, essence, philosophical and psychological meaning and effect of color pattern, texture, and spatial measure: size, shape, distance, dimension, perspective, relationship, etc. It includes abstract dimensions and patterns, graphics, layouts, etc. That higher artistic sense is the source of abstract art, animated films, computer graphics, fractal geometry, new clothing designs and styles, modern architecture, etc.
- ⇒ A moderate motivation indicates that this person is aware of beauty, color, and spatial measure: size, shape, perspective, and dimension. If and how that artistic awareness is applied depends on the presence, motivation, and influence of related traits: art, photography, oil painting, sketching, abstract art, mechanical drawing, landscape architecture for golf courses; layout of newspaper ads, computer publishing, or pasting. The various possible traits constructed determine if and how that artistic talent will be used and applied.
- ↓ Low motivation indicates that this person has little artistic interest; and if interest is low, artistic talent has probably not been developed. Certainly, the use of artistic details and processes in job context would be problematic for people without such interest.

F. Mental/sensory skills in handling fine detail

F Mental/Sensory Skills in Handling Fine Details: talented mental/sensory/physical ability to work with fine detail, close tolerances, very accurate pinpointing of specific functions (such as working on computer chips or connecting wires of phone cables). In addition to the skills, a high rating here indicates tolerance of routine, willingness to concentrate for a long time, and ability to work apart from others if necessary.

Mental/sensory skills in handling fine detail requiring the ability to accurately and efficiently handle small objects and detail with concentration, coordination, timing, rhythm, etc.

↑ **Handling fine detail** could and should be called the needlepoint trait, because that identifies what is required to get a high rating:

- (1) ability or potential to handle and manipulate small objects rapidly and accurately;
- (2) excellent perception of, and concentration on detail;
- (3) keen visual awareness of spatial measure relative to detail;
- (4) nimble skills of fingers, hands, wrists, and arms;
- (5) durability in routine activity; and
- (6) tangible problem solving drive (e.g. repairing a small wrist watch).

A high motivation indicates that this person has that construct of talents in order to get a high rating for this Worker Trait. With continued industry emphasis on miniaturization, this is a valuable talent.

⇒ A moderate motivation indicates that this person has the ability and potential (aptitude) to handle and manipulate small objects rapidly and accurately, with good concentration, for a considerable length of time. Although an aptitude, the only way of knowing if this trait is adequately motivated for steady handling of detail is to review all Worker Traits related to detail, concentration, keen visual awareness, extended routine, and handling of functional problems.

↓ Low motivation indicates that this person does not want to handle minute manipulation of detail for extended periods of time. Splicing telephone wires at a switchboard installation is not this person's idea of a chosen career, nor is knitting a sweater to enter in a county fair competition.

G. Intellectual and/or analytical orientation

G Intellectual and/or Analytical Orientation: ability to reason and make judgments; to think conceptually, strategically and logically; general ability to catch on and figure things out; may be academic, intellectual, scholastic, technical, scientific, intuitive, creative, etc.; mind centered and dealing with ideas; often includes a cultural orientation. “Culture is acquainting ourselves with the best that has been known and said in the world, and thus with the history of the human spirit.”, Matthew Arnold.

Intellectual and/or analytical orientation requiring the ability to perceive, understand, reason, make judgment, and decisions relative to conceptual, holistic, or strategic thinking and expression. This applies to intellectual, philosophical, academic, scholastic, executive, or technical activities.

- ↑ A high motivation indicates that this person has excellent talent for a wide range of mental activities: philosophical, cultural, scientific, literary, managerial, and/or computational. Being capable in those activities, this person’s mind is adept with abstract ideas, theory, concepts, inquiry, exploration, analysis, logic, systems, and procedures. Factors in this **aptitude** section, plus the **data** and **reasoning** sections show the degree of motivation and talent this person has for each of those mental activities. High rating for this trait indicates an intellectual orientation which is functional in, or has potential for academic, scientific, research, literary, executive, or consulting activities.
- ⇒ A moderate motivation indicates that this person has mental talent for intellectual and/or analytical work. Review of the Worker Trait will identify this person’s potential for philosophical, cultural, scientific, managerial, and/or computational activities. Motivation for this factor means that interest in all areas listed probably does not mean equal motivation or talent for all. So scanning of related Worker Traits is necessary to identify the mix of traits involved in this analytical/intellectual orientation.
- ↓ Intellectual and/or analytical activities aren’t particularly important for this person. Because this factor measures talent in 5 major areas plus 3 lesser areas, low motivation indicates that this person may have high ratings in one or more of those areas, while this average rating for the entire collection of them is low. Therefore, it is important to review all Worker Traits related to mental activity to determine which activities are motivated for this person.

K. Mental/sensory coordination of physical action

K Mental/Sensory Coordination of Physical Action: general ability adequate to perform usual sensory/physical functions; does not need or indicate highly developed or trained sensory/physical skills; priority of sensory/ physical activities is probably secondary to other activities.

Mental/sensory coordination of physical activity requiring response, timing, coordination, dexterity, etc. in sensory/physical activity related to general vocational or recreational activities; implies adequate talent or aptitude, but not necessarily highly developed skills.

- ↑ Subconsciously and consciously, a high motivation indicates that this person applies and uses the five senses and physical talents as an immediately available system for use by the mind. This causes good coordination, dexterity, timing, rhythm, and ability with simultaneous functions—like operating a power shovel or crane, or seeing a ball and swinging a bat at the right time and the right place. Excellent sensory/physical skills are the result of subconscious processes taking over from by-the-numbers consciousness, telling the body what to do. This kind of conscious-to-subconscious switch-over usually takes about 21 days, if it is going to become effective and fully subconscious.
- ⇒ A moderate motivation indicates that this person has good sensory/physical coordination, dexterity, timing, rhythm, and ability to perform simultaneous function—called “eye-hand-foot coordination” by the Dictionary of Occupational Titles. This talent exists because of good linkage between perception, mind, senses, and physical talents.
- ↓ Low motivation indicates that this person does not have highly developed, consistently reliable sensory/physical skills. There is little on-going drive to physically perform better each time, to beat one’s last score (as in golf), to be the best operator in the crew, to look forward and back at sensory/physical activity as challenge and fun. Instead one assumes the sensory/physical system (the body) is on-call and will perform to demands and expectations.

N. Computational or analytical use of numbers

N Computational or Analytical Use of Numbers: measuring ability, potential and/or motivation to understand and perform arithmetic operations quickly and accurately. More than any other trait or Worker trait Code factor, *potential* for math does not necessarily mean ability *to do* specific kinds of math. Math talent becomes math skill *only* by formal study or apprenticeship learning of the specific kind of math which the person must use vocationally.

Computational or analytical use of numbers requiring the ability or potential (if trained) to perform arithmetic operations logically, accurately, and quickly; computational, statistical, analytical, administrative, scientific and/or technical.

- ↑ High rating with this *computational/analytical* factor means that all kinds and uses of numbers naturally make sense to this person. This person is conceptual, theoretical, analytical, and computational in the awareness in, use of, and application of, math. As such, math is an important vocational asset whether it be vocational specialization or vocational application.
- ⇒ A moderate motivation indicates that this person has good awareness and ability with mathematics. Other Worker Traits will indicate which kind of math that talent applies to: theoretical, statistical, analytical, computational, business, administrative, clerical, arithmetic, or posting. Wherever it works best, it is a vocational asset.
- ↓ Math may be about the same as a foreign language for this person. At least, it is foreign to this person's mental orientation in one way or another. Mathematical problems seem to become bigger problems if this person tries to solve them. Mental gears seem to get jammed in the middle of a math problem, and success in the form of solution, is without internal reward or satisfaction.

P. Sensory/mental awareness of “pieces of the picture”

P Sensory/Mental Awareness of Pieces of The Picture: awareness of existence, importance, and relationship of things relative to other things, and then those things relative to possible larger contexts for them; ability or potential to perceive pertinent detail in objects or in pictorial or graphic material; to make visual comparisons and discriminations and see slight differences in shapes and shadings; intra-holistic awareness of a part to part and a part to the whole.

Sensory/mental awareness of pieces of the picture requiring the natural ability to visually and mentally see relationship and linkage of things (pieces of the picture) to the big picture and to other pieces; intra-holistic awareness of a part regarding other parts, and all parts relative to the whole in various configurations.

- ↑ **Sensory/mental awareness of pieces of the picture** is the capacity for comparative, intra-holistic recognition of a parts relative to other a parts and/or the big picture. It includes ability to see essential detail, and make visual/mental comparison and discrimination relative to relationships of objects. The definition says pieces *of* the picture, so it recognizes the picture and its larger context. But this trait still emphasizes pieces and their status as pieces. If awareness of the *pieces* is more strongly motivated than seeing the big picture, then a high motivation indicates that this person gets to see the big picture by putting the pieces together.
- ⇒ A moderate motivation indicates that this person is aware of detail as essential detail; i.e. detail is not *just* seen as detail, but as detail that has linkage and relationship with something larger, unitary and complete. Detail is, therefore, seen as a piece of the picture. If not seen *as a part* of the known picture, it is seen as most likely important for a probable picture. In other words, a moderate motivation indicates that this person is motivated to build or fill something meaningful with what is at hand. This is a practical, objective, manipulative, or managerial orientation related to what must be, or could be managed.
- ↓ Low motivation indicates that this person is inclined to prefer to wing it by intuitive or conceptual awareness of the big picture without taking into account, or taking count of, the specific pieces of the picture. Very often, such intuition is (or has been) reliable and is, therefore, trusted for guidance and decisions. Such assumption carries greater risk. It is something akin to driving without a map, or flying without instruments.

Q. Sensory/mental awareness of detail per se

Q Sensory/Mental Awareness of Detail Per Se: natural visual awareness of detail, mental reception and retention of detail, and excellent mental recall of detail; excellent scanning for detection of detail related to previously seen things that are similar; valuable in administrative, secretarial, clerical, inventory, teller, cashiering, supermarket, parts room, or mailroom activities.

Sensory/mental awareness of detail per se requiring natural perception, retention and recall of detail. Occupational emphasis on detail relative to clerical, administrative, computational, technical, or procedural activities. This assumes sustained awareness, accuracy, and recall.

- ↑ A high motivation indicates that this person has natural, constant perception, retention, and recall of verbatim detail. That is detail which registers, as accurately as possible, that something exists. Its source, meaning, utility, and/or potential are secondary or irrelevant compared to its existence, documentation, and availability for later reference or use. In appraisals, this is the core definition for clerical detail. Computational and literary traits contribute to this awareness.
- ⇒ A moderate motivation indicates that this person has good ability to see, retain, and recall detail. It is not a fixation on detail, or a vocational specialization based on detail. Awareness of detail is a useful talent in functional, operational, or administrative activities.
- ↓ Low motivation indicates that this person is not aware of specific detail except in, and during, strongly motivated activities. There may be a place for everything, but everything doesn't always (or often) get to that assigned place. If involved too much or too long with detail, low motivation indicates that this person can actually experience "clerical claustrophobia" that would lead to psychosomatic consequences.

S. Mental/sensory awareness of the “big picture”

S Mental/Sensory Awareness of The Big Picture: global perception and comprehension; naturally holistic, conceptual, open-ended awareness, perception and thinking; with a broad, in-depth, inclusive view of things; to be open-minded and inquisitive; frequently described as ability to visualize objects in two or three dimensions, or mentally see geometric forms; Philosophical and scientific minds have some or all of these characteristics.

Mental/sensory awareness of the big picture requiring holistic, conceptual perception, and thinking relative to the basic nature, potential, utility, and/or strategic possibility of what is being observed or considered. Mental/sensory awareness calls for work with ideas, theories, concepts, options, assessment, and choice of options, development of strategies, etc. Intuition, insight, imagination, and creativity may be involved.

- ↑ A high motivation indicates that this person has holistic, conceptual perception, and thinking relative to the basic nature, utility, potential, or strategic possibility of what is being observed or considered. This includes intuition, insight, creativity, curiosity, experimentation, and innovation in various degrees. Ideas are at the heart of this Worker Trait. Its basic orientation is perceptual and mental seeing.
- ⇒ A moderate motivation indicates that this person is able to see the big picture and handle things in that larger context. This ties yesterday and tomorrow to today, ties possibilities to present fact, and leaves open options instead of closed systems. This is a useful talent if this person is involved in analysis, planning, strategy, assessment, or choice of options.
- ↓ Low motivation indicates that this person lives and works with reality, tangible evidence, practical utility, and talent gained through experience. The big picture tends to be like some mirage on a desert; it is hard to get a handle on things that keep moving away from you. Low motivation indicates that this person wants to count on things and pin them down in order to best use and rely on them.

V. Literary and/or communicative orientation

V Literary and/or Communicative Orientation: intentional exposure to communication from the minds of others, and communication to the minds of others via various `media' options; understand meaning and use of words related to ideas and use them effectively; comprehend language, understand relationship between words, and develop quality in communicative form and content.

Literary and/or communicative orientation requiring academic, scholastic, professional, literary, journalistic, cultural, and/or media ability to understand ideas and words; to effectively use ideas and words; and to effectively communicate them in written or oral form.

- ↑ A high motivation indicates that this person understands the meaning of ideas and words, and uses them effectively in written or oral communication. **Literary** in this factor means intentional search for ideas expressed by the minds of others for one's own use, assimilation, learning, etc. The source can be books, other publications, historical documents, research information, drama, movies, television, the new information highway via computer, etc. Emphasis is on communication: picking up information from minds of others, or communication aimed toward the minds of others. Journalism and writing are major activities. Literary activity is not exclusively intellectual, academic, or cultural. It may be an end in itself—a bookworm for instance. Literary activity is not always accompanied by communicative activity—written or oral. On the other hand, communicative activity need not be literary in the classic sense. And one need not be persuasive to be communicative—but it helps. When the trait is highly motivated, as it is here, it suggests both literary and communicative talent. By now, you can see that only a review of all Worker Traits will clearly show the specific content of this person's literary and/or communicative orientation.
- ⇒ A moderate motivation indicates that this person has literary and/or communicative talent which is sufficiently motivated to be vocationally important. Emphasis is on communication: (1) picking up information from the minds of others, or (2) communicating to the minds of others. So moderate motivation indicates that this person tends to be media-conscious for absorbing or expressing ideas—or both. This may be an activity dedicated to itself—like journalism. Or it may be a part of other activities—teaching, library work, publication, administration, etc.
- ↓ Low motivation indicates that this person relies on ways other than literary to obtain or communicate information. Literary activity is a secondary process, not a direct experience. Example: Apprenticeship learning is more direct than classroom explanations, or information from a book. And it may be that low motivation indicates that this person relies on intuition, imagination, curiosity, investigation, analysis, and/or innovation to learn, gain knowledge, and experience, and then vocationally apply it. Review of Worker Trait factors will show his person's communicative orientation.

E. Simultaneous Skills in complex Physical Tasks:

E Simultaneous Skills in Complex Physical Tasks: operating a power shovel or other heavy equipment, playing a pipe organ, playing basketball or baseball, a pro-football quarterback or receiver, all require highly skilled eye-hand-foot coordination. It actually requires fused mental/sensory/physical skills with emphasis on the subconscious mind as key to those skills. It requires fusion of mental/sensory/physical/mechanical skills for operating equipment. Timing, coordination, dexterity, rhythm, depth perception, and feel (another way of hearing) are very important, again based on subconscious activation.

Requiring fused mental/sensor/physical skills with emphasis on the subconscious mind as key to those skills

- ↑ High motivation indicates a complete fusion of mental/sensory/physical/mechanical skills for the operation of equipment. Requiring timing, coordination, dexterity, rhythm, depth perception, and feel (another way of hearing) based on a subconscious mind activity. These skills are created over a long period of time in the field of heavy equipment. Other areas of accomplishment are demonstrated by piano players, professional athletes, football, basketball, baseball. Seldom, if asked, will these individuals be conscious of their outstanding accomplishments and can not explain why they excel.
- ⇒ A moderate motivation indicates that this individual has good timing, coordination, dexterity, rhythm, depth perception, and feel (another way of hearing) based on a subconscious mind activity. Can operate heavy equipment satisfactorily under most circumstances. A review of the Interest area, and other areas will tell how this individual will work for prolonged periods of time at the intensity level necessary to sustain high performance.
- ↓ Low motivation indicates that this person does not have the highly developed timing, coordination, dexterity, rhythm, depth perception, and feel (another way of hearing) skills necessary to operate or sustain any satisfactory level of performance. Referring to their inability to perform physical activities requiring any degree of complexity.

M. Manual dexterity in routine ‘workbench’ activities:

M Manual Dexterity in Routine ‘Workbench’ Activities: Emphasis is on routine handwork at a work ‘station’ where an individual processes something. Activity can be assembly, disassembly, repair, troubleshooting, assembly line processing, etc. Eye-hand coordination is the central activity. Conscious mental activity may or may not be involved.

Routine handwork at a fixed work ‘station’ where an individual processes something..

- ↑ High motivation indicates a well defined ability to work for long periods of time in a routine activity dependent on hand-eye coordination. Other trait areas should be reviewed to support this trait if it is a requirement of the job. Those areas could be: routine, change and variety, people, things. These areas should support a high motivation. These skills would tend to be in the physical areas; assembly disassembly, repairs, assembly line processing, etc. Conscious mental activity may or may not be involved.
- ⇒ A moderate motivation indicates a good hand-eye coordination and ability to perform repetitive tasks for a given period of time. Showing good physical talent but limited to hand-eye coordination. Conscious mental activity may or may not be involved.
- ↓ Low motivation indicates that this person does not have a highly developed ability to perform a coordinated task for prolonged periods of time at a fixed station. Individuals can pose a higher degree of hand-eye coordination, but that ability is short in duration and will be driven by a need to succeed or a need to accomplish another task. This individual will require a strong mental orientation to remain focused on the task at hand.

People: Relationships, Roles, Interaction

In this section, seven *people* factors cover important activities related to the interaction of a person with other persons. These are very important for persons motivated and talented for associating and interacting with people. They may also be important traits for certain people-intensive jobs. (Low ratings in this section can also be quite positive and valuable if occupations necessitate or require that an individual function apart from others, manage his/her own activities, and be satisfied with work in isolation.)

The 8 measured Worker Trait Codes are:

0	Mentor: size up people, personalities, motives	1
1	Negotiate: confront, communicate to achieve goal	3
2	Instruct: teach, train, influence, demonstrate	1
3	Supervise: plan, manage work activity of others	2
4	Entertain: to deliberately influence others	1
5	Persuade: assertively influence, convince others	3
6	Service communication: voluntarily inform others	1
7	Social service directly benefiting others	2

Mentor: size up people, personalities, motives

0 Mentor: Size Up People, Personalities: holistic, conceptual, philosophical awareness of the existence, meaning, purpose, potential, and destiny of mankind, people, persons, and self; with self-felt and self-accepted calling to cause good, growth, and gain in the lives of others; relating to individuals in terms of their total personality in order to advise, counsel, or guide them with regard to potential that may be achieved or problems that may be solved by counseling, spiritual, psychological, scientific, legal, or other professional efforts.

Mentor: size up people, personalities, motives requiring philosophical and psychological awareness of, and interest in the total personality of others; conscious of existence, meaning, purpose, potential and destiny of people, persons and self; responsibility (calling) to cause, influence or manage good, growth and gain in the lives of all concerned. This trait is associated with cultural, academic, philosophical, psychological, philanthropic, spiritual, or medical activities. Intuition, insights, empathy and sympathy are involved relative to human nature.

↑ **Mentor: a wise or faithful adviser or monitor.** A high motivation indicates that this person is interested in, and conscious of existence, meaning, purpose, potential, and destiny of mankind, people, persons, and self; with self-felt, self-accepted responsibility to influence and/or cause good, growth and gain in the lives of all concerned. A high motivation indicates that this person has intuition and philosophical curiosity which causes an awareness of personality, intentions, emotions, ethics, values, and moods of other persons—and of self. By itself, this is not benevolence; it may or may not be accompanied by strongly (or moderately) motivated benevolence. If it is, this trait is compulsively central to personal and vocational activities. If not, it tends to be more philosophical or academic in nature—but still *service oriented*.

⇒ A moderate motivation indicates that this person is interested in people, philosophically and psychologically. That interest causes a personal, ethical interest in the potential and destiny of others. If that interest is reinforced by strong benevolence, this person is active in service directly involved with, and beneficial for others. It is important to see if a moderate motivation indicates that this person is benevolent, gregarious, managerial, persuasive and/or dedicated to harmonious relations. Each or all of those traits can be interactive with this *mentoring* trait and strongly influence the *if, how* and *why*, that mentoring is done.

↓ Low motivation indicates that this person has little interest in, or awareness of the personality, motives and interests of others. Self-awareness comes first; and self-interest has first priority. It is therefore *very* important to find out what is involved in this person's self-orientation and self-interest. If *benevolent, gregarious, harmonious* and/or *managerial* traits are strongly motivated, it means that a high priority of self-interest is to be in compatible, mutually productive, and beneficial interaction with others—and that is a form of benevolence and service. If benevolent and/or gregarious traits have low motivation, then this person may tend to be quite self-oriented and self-centered.

Negotiate: confront, communicate to achieve goal

1 Negotiate: Confront, Communicate to Achieve Goal: exchanging ideas, information, opinions and logic with others to formulate mutually agreeable or acceptable decisions, conclusions, solutions, policies, or programs; also involves personal and/or role assertion, persuasion, and sometimes aggression to win others to one’s own opinion and/or position.

Negotiate: confront, communicate to achieve goal requiring responsibility, confidence and drive for assertive, aggressive efforts to achieve specific objectives in deliberate encounters with others through persuasive, competitive, strategic, analytical talents. It is an intentional confrontation of one’s will with the will of others to deliberately win the contest. Domination and intimidation could be involved.

- ↑ This high drive to negotiate is intellectual more than psychological, assertive more than aggressive, logical more than emotional, strategically winning the contest more than persuasively winning a skirmish. A high motivation indicates that this person is strongly motivated to represent one position in a confrontation of different views and objectives; and is motivated and determined to apply logic, strategies and communicative skills to cause agreement, compromise, concession, or submission by opposing positions or views. Persuasion is probably involved; at least it is an asset—but it is not essential. Intimidation may be involved, but it is a poor tool for achieving objectives. Strategic thinking is the key element and is also represented in the *reasoning* section (factor 1).
- ⇒ A moderate motivation indicates that this person has motivation and talent for assertively negotiating. This includes strategic thinking, influential communication, analysis, and/or persuasion. Many traits are involved and their motivational levels determine the amount of involvement and influence of each trait. Strategic thinking is the key element.
- ↓ Low motivation indicates that this person does not want responsibility for, or involvement in negotiating activities. Not comfortable to be in confrontational, adversarial, or competitive interaction with others, low motivation indicates that this person would rather associate with others on the basis of mutual interest or service, or even function independently.

Instruct, teach, train, influence, demonstrate

2 Instruct: Teach, Train, Influence, Demonstrate: teaching subject matter to others, or training others (including animals) through explanation, demonstration, leadership, control, and/or supervised practice. This includes strategic planning, creating and maintaining a quality learning environment, and motivating the learners.

*Instruct, teach, train, influence, demonstrate, requiring ability to have useful knowledge; assemble that knowledge in presentable communicative form; and effectively communicate that information by various means to cause others to effectively understand and use that knowledge. Such communication can be in many forms, using many media outlets, for many purposes. **Philosophical, literary, scientific, managerial, and/or persuasive** traits may be involved in this person's talent and drive to educate, train, or influence others. The main objective is to share knowledge and information that will be useful. So, conveying information to others assumes that educating self precedes educating others.*

- ↑ A high motivation indicates that this person enjoys learning, sees the big picture, recognizes how pieces fit the picture, and gains from passing information on to others. Because so many traits might be involved in *instructing* activities, it is important to scan the Worker Traits to see which traits are important.
- ⇒ A moderate motivation indicates that this person is motivated to educate—which here means to share knowledge that will be useful for the persons taught. Instructing can be in many forms: teaching, training, influencing and demonstrating. It is done through various combinations of traits; and there are many traits which could be involved. So it is necessary to scan all Worker Traits to discover why and how this person instructs others.
- ↓ Low motivation indicates that this person functions primarily on the basis of natural, sensory and/or physical talents—and has little inclination toward instructing others. Learning is primarily experiential and best accomplished through apprenticeship or self-experimenting. Low motivation indicates that this person is willing to share knowledge of how to do things.

Supervise: plan, manage work activity of others

3 Supervise: Plan, Manage Work Activities of Others: a member of management who, in the eyes of the workers, is the personification of management because he or she is responsible for their activities at all times; including planning, scheduling, assigning work, requiring performance to certain standards, motivating people, reporting work done for compensation (or seeing that it is done).

Supervise: plan, manage work activity of others required to plan, assign, direct the vocational activities with responsibility for outcomes of their work. This can include executive, managerial, supervisory, group leader, expediting or dispatching activities. Emphasis is on performance and achievement by utilizing the talents of people.

- ↑ A high motivation indicates that this person willingly accepts responsibility for planning, assigning and supervising work activities of others in operational or administrative activities. Emphasis is on daily scheduling, procedures, expediting, motivating, solving problems as they arise, and meeting functional objectives. This activity has prime responsibility for developing the will to work in employees and motivating them to higher levels of attainment and performance.
- ⇒ A moderate motivation indicates that this person has talent for planning, assigning, directing, supervising and monitoring work activities of others. This is direct, steady on-site contact and interaction with those being supervised. It includes responsibility for morale, attitudes, attendance, training, safety, and getting adequate quality and performance from employees.
- ↓ Low motivation indicates that this person does not want management or supervisory responsibilities. Instead, low motivation indicates that this person would rather function under management by others, or function independent of any supervision.

Entertain to deliberately influence others

4 Entertain to Deliberately Influence Others: amusing others through communicative or staged efforts to gain acceptance, approval, favorable response, or increase of status; the primary function is keeping their attention by causing pleasure or satisfaction; the objective is to make an impression, make a point, make a sale, make a living, or gain friends. Entertainment can also simply be a “show-off” that has the opposite effect regarding the intended objective.

Entertain. To deliberately influence others to purposefully act to attract and keep the attention of others; pleasantly influence others relative to specific ideas, concepts, symbolism, policies or objectives in order to sway them toward positive acceptance or agreement with the presentation. This can be cultural activity, entertainment, marketing, advertising, selling or promotional activity.

- ↑ A high motivation indicates that this person relies on persuasive, gregarious, auditory-musical, visual-artistic and communicative traits to entertain others with intent to convince them toward a particular idea, viewpoint, direction, objective or product. In this Worker Trait context, entertainment is more than pleasing people. It has promotional and marketing objectives. Some activities for this trait are: marketing, sales, public relations, television commercials, lobbying, political campaigns, promotional consulting, sports announcing, etc. It can also be the effort of the individual to get ahead in various areas of entertainment and/or acting, i.e., to advance one’s own career. Persuasion is the primary trait. There is an element of risk involved because the effort has a goal tied to the end of the act.
- ⇒ A moderate motivation indicates that this person enjoys being on stage in order to pleasantly influence others toward a particular viewpoint, objective or product. Gregarious and persuasive traits are probably well motivated. A moderate motivation indicates that this person is comfortable with a spokesperson role—even energized by it. Because this trait is moderately motivated, this person is not stage-struck toward entertaining or acting to the exclusion of other activities or responsibilities. This activity is more influencing than promoting or selling per se.
- ↓ Low motivation indicates that this person is not persuasive in the sense of entertaining to influence, is basically not very comfortable with performing before people, and is not motivated to take on the risk of promotional work as a part of vocational activities.

Persuade: assertively influence, convince others

5 Persuade: Assertively Influence, Convince Others: to communicatively assert one's will in direct encounter with the wills of others to cause the wills of others to agree with, or submit to one's own will relative to a predetermined objective; to gain direct access to the listener, to communicate to the listener, to cause the listener to hear, understand, accept and act on what is said.

Persuade: assertively influence, convince others to strategically, intentionally influence and convince others; ability to make cold calls and close agreements, sales, contracts. This is a direct, personal, psychological encounter with the personalities, interests and wills of others with intent to cause them to hear, understand, accept, agree with, and act on what is intended.

- ↑ Highly motivated **persuasion** means that this person intends to assertively, even aggressively make direct personal contact with others, orally project a message with the deliberate intent and attempt to cause the listener or listeners to hear what is said, accept what is said, and act on what was said, so that a high motivation indicates that this person can close the deal. If it is for commission (i.e., in the seller's interest), it will be a hard-sell even though it might come across as soft-sell. If it has philosophical or benevolent objectives, it will be soft-sell. But if this person is defending and/or championing the cause of the underdog or the less fortunate, then it will seem as if some modern-day Don Quixote and/or Joan of Arc are doing the persuading. **Note:** As a single trait, persuasion is the most deliberately assertive, often aggressive psychological expression/effort of an individual.
- ⇒ A moderate motivation indicates that this person is ready, willing and able to persuasively influence others with the intent or hope to convince them to agree with what is said. Because this trait is moderately motivated, this person is probably not inclined to make a living by selling on a commission basis. Instead, persuasion is interactive with other traits and finds expression in other ways such as teaching, counseling, etc.
- ↓ Low motivation indicates that this person is not persuasive and will avoid oral communication if it requires psychological jousting with others. Therefore, low motivation indicates that this person wants to know, in advance, the purpose and the psychological environment to be expected when in unplanned, unstructured social encounters with others. It is also not very comfortable for this person to be persuasively or psychologically dominated or intimidated by others.

Service communication: voluntarily inform

6 Service Communication: Voluntarily Inform Others: willing, voluntary, even intentional communication in order to provide useful and/or beneficial information to others relative to their interests, activities, needs or objectives. Voluntary service is the primary motivation. Benevolent, literary, clerical and/or administrative traits are likely to be involved.

Service communication: voluntarily inform others to willingly offer and communicate information that is helpful for others; it can be called communicative benevolence. Literary, gregarious and benevolent traits are often involved—but they are not necessary. Examples of service communication: public relations, customer relations, receptionist, librarian, travel or real estate agent.

- ↑ A high motivation indicates that this person feels both privilege and responsibility to use communicative talent (including persuasion) to voluntarily provide beneficial information to others. This includes strongly motivated benevolent and literary traits. Self-satisfaction comes almost exclusively from the subjective realization that the information, voluntarily given, has been helpful to other persons. That service communication is enhanced by this person having empathetic interest in knowing the other person or persons—their needs, wishes and communicative (listening) orientation. Non-persuasive service communication can become persuasive, and persistent, when expressed in the interest of someone needing a high motivation, and indicates that this person will stand up for them.
- ⇒ A moderate motivation indicates that this person voluntarily communicates to others with the intent or hope that the information will be in their interest and for their benefit. At medium motivation, it is probable that benevolent and literary traits are more strongly motivated than the persuasive trait. The persuasive trait might have low motivation, but the sense of service responsibility will cause willingness, even duty to communicate.
- ↓ Low motivation indicates that this person feels little inclination or responsibility to offer information to others. Benevolent, literary and persuasive traits (in that order) are usually involved in voluntary service communication. Because motivation is low, it means that one, two or all of these traits have low motivation. It is valuable to determine which, if any, of those traits, cause disinterest in service communication.

Social service directly benefiting others

7 Social Service Directly Benefiting Others: motivation to sacrificially give of self to benefit others; concerned consciousness of the hurts, pains, problems and needs of others on a personal, situational or circumstantial basis; self-satisfaction and self-esteem gained by willingly helping others; to intentionally put others first.

Social service directly benefiting others requiring helpful social, caring or helpful service provided by a person in the interest of others. This can include benevolence, empathy, sympathy, personal care and/or nurturing. Related vocational activity: nursing, day care, counseling, social work, etc. Most of all, it is direct person-to-person involvement of one person to help another person.

- ↑ A high motivation indicates that this person is compulsively motivated to personally help others—to voluntarily, perhaps even sacrificially, give of self in their interest. On a single trait basis, this trait subjectively imposes more vocational calling, responsibility, and duty on the individual than any other trait. It is compounded if accompanied by a strongly motivated philosophical trait. It is further equipped for vocational ability by motivated managerial, gregarious, persuasive, scientific, clerical and/or routine traits. It becomes more sensitive, intuitive, empathetic, and sympathetic if accompanied by need for, and dedication to, harmonious and compatible relations with others. It is therefore evident that many other traits can be involved. Review of all Worker Traits will show which traits are involved in this person’s social service. Medical practice, nursing, psychiatry, psychology, counseling, guidance, ministry, social work, volunteer social service, search and rescue, public defender activity in law—these are specific areas where a high motivation indicates that this person would find vocational expression and satisfaction.
- ⇒ A moderate motivation indicates that this person is empathetically and sympathetically aware of the hurts, needs, problems and wishes of others—and is willing to help whenever possible. There is inclination and willingness to get personally involved in the personal lives of others in order to help with one’s talents and resources. Although this social service trait is only moderately motivated, it is hard to ignore, or say “no” to, anyone less fortunate.
- ↓ Rather than putting others first, low motivation indicates that this person’s first priority is for self, self-interest, status and recognition. Low motivation indicates that this person does not like to lose; so all options and choices are evaluated on the basis of the chance of gain versus the chance of loss *before* a decision or commitment is made. Stress and frustration are experienced when things aren’t going this person’s way. Pleasure, enthusiasm and energy are experienced when things are going this person’s way. Association and relationships are chosen, maintained or abandoned on the basis of self-interest.

Things: Engineering, Operating, Sensory/Physical

Things: Engineering, operating, working with things, manipulation of materials and processes, and cognizance of operational and mechanical forces or objects, highlight this Worker Trait Code section. None of the factors in this section are directly related to people nor call for exclusive *mental* talents. However, these factors *do* call for the interaction and interplay between *mental, sensory, physical*, and *mechanical* skills. If the individual has a natural mechanical savvy, and likes to work with his/her hands, then this becomes a highly important and relevant Worker Trait Code section.

The 8 measured Worker Trait Codes are:

0	Engineering, technical planning, installation	2
1	Precision/quality: technical, mechanical standards	1
2	Operate/control: on-site machine operation	1
3	Drive/Operate: mobile and heavy equipment; controls	1
4	Manipulate: physically manage material processes	1
5	Tending: monitoring/adjusting gauges, switches, controls	1
6	Feeding/offbearing: manual labor timed by machines	1
7	Handling: basic, routine manual labor	1

Engineering: technical planning, design, installation

0 Engineering, Technical Planning, Installation: planning, design, layout, installation of machines; knowledge of assembly, operation, leverage, force, motion, and power; also includes systematic, methodical achievement of projects or objectives by use of instruments, machines and equipment. This is primarily an activity of the mind, but it most often leads to an extended fused linkage: mental/sensory/physical/mechanical.

Engineering: technical planning, design, installation requiring design, layout, testing, installing, improving, monitoring regarding machines, systems, hardware, software, operations, etc. Mechanical awareness, intuition, curiosity, experimentation and implementation are important traits for this activity. In short, it is called mechanical savvy and know-how.

- ↑ A high motivation indicates that this person is motivated and talented for mechanical engineering, including:
- (1) natural mechanical awareness of assembly, fabrication, operation, leverage, motion, force and power;
 - (2) ability to design and/or draw technical plans;
 - (3) technical, statistical and numerical analysis; and
 - (4) layout and installation capability. This highly motivated, multi-talented engineering orientation probably means professional dedication to a major engineering vocation.
- ⇒ A moderate motivation indicates that this person has interest and talent related to mechanical, technical, or systems engineering. It includes natural mechanical savvy about what makes things tick and motivation to design, assemble, build, install or operate machines, equipment or systems. Engineering may or may not be the major vocational activity. A moderate motivation indicates that this person's specific engineering orientation becomes clear when all factors in this Worker Trait Code section are studied. Many traits can be involved in various combinations. It is advisable to also review the ***Interest*** and ***Temperament*** sections.
- ↓ Low motivation in this area indicates that Engineering activities, regarding mechanics, systems, etc., do not fit this person's vocational interests or talents.

Precision/quality: technical/mechanical standards

1 Precision/Quality: Technical, Mechanical Standards: responsibility and talent for attainment of precise standards, tolerance and quality; involves selection, knowledge and expert use of sophisticated measuring devices to determine and control precision and quality; requires considerable judgment, concentration, and specialization.

Precision/quality: technical, mechanical standards requiring technical, operational control of specifications, tolerance and quality; responsibility for attainment of precise standards. This requires perceptual and mental concentration.

- ↑ A high motivation indicates that this person has highly developed skills which interact to cause excellent awareness of technical and mechanical standards as they relate to quality and precision. Concentration and focus are strong. Precision, quality and standards are natural, highly developed elements of perception, thinking and logic. This is a very important skill in industries where production, maintenance and repair require exact precision, high quality, and next to zero in allowable defects or error.
- ⇒ A moderate motivation indicates that this person has adequate skills and interest to be responsible for technical, operational control of tolerances and quality; for attainment of precise standards and identification of defects. This is a very important skill in industries where production, maintenance and repair require exact precision, high quality, and next to zero in allowable defects or error.
- ↓ Low motivation indicates that this person is not motivated or equipped for activities requiring close, constant attention to precise standards, exact measurements, close tolerances, detection of minor defects, and long concentration on the process. Instead, there is a demonstrated need for change, variety, and activities with less concentration and specialized focus.

Operate/control: on-site machine operation

2 Operate/Control: On-Site Machine Operation: starting, stopping, controlling, and adjusting the operation of stationary machines. Operating machines involves setting up and adjusting machines prior to and in the process of operation. This involves observing gauges, dials, etc.; manipulating controls, valves, etc. to control factors such as material processing and flow, load limits, tolerances, lubrication, temperatures, pressures, etc.

Operate-control: on-site machine operation required to set up, operate, control, feed on-site, stationary machines; responsible for machine operation, performance, output, quality, maintenance, and adjustment.

- ↑ A high motivation indicates that this person has good awareness and ability to run/manage fixed machine operation; and to be responsible for machine performance, condition, output and quality. This necessitates constant awareness of what is happening with the machine itself, with the processes being done by the machine, with materials going into the machine, quality of materials coming from the machine, and how and when to make adjustments and provide maintenance. A number of functions are involved and require a variety of talents—the most important being machine savvy, alert monitoring of operations, and coping with routine.
- ⇒ A moderate motivation indicates that this person likes and understands machines, has ability to operate controls and observe machine performance, and copes well with the routine involved with fixed-site machine operation. This person is moderately motivated for on-site machine operation rather than being dedicated to that activity. So tenure in the position may not be guaranteed for extended time for this individual. However, it may be extended by merit raises, variety of work assignments or activities, etc.
- ↓ Being stuck to a machine all day is not this person’s definition for a satisfying vocation, occupation or job. There is little interest in, or understanding of machines; little interest in steadily monitoring machine performance; and little coping with routine that is required.

Drive/operate: mobile and heavy equipment; steer, control

3 Drive/Operate: Mobile and Heavy Equip, Controls: starting, stopping, steering and controlling the actions of mobile equipment or machines in order to load, move and deliver things (materials, products, people, etc.) from one place to another; requires sense of machine operating capacity and limits regarding load, use, safety; relies on mechanical, managerial, visual, and auditory traits.

Drive-operate: mobile and heavy equipment; steer, control required to operate mobile mechanical equipment; have knowledge and skills to cause effective equipment performance; most often applies to heavy construction, excavating or transportation equipment such as shovels, cranes, bulldozers, trucks of all sorts, rock crushers, locomotives, aircraft, etc. Operator skills are required relative to specific equipment and activity.

- ↑ A high motivation indicates that this person enjoys operating heavy, mobile equipment such as trucks, earth-movers, cranes, etc. Sensory and sensory/physical skills are primary: e.g. coordination, dexterity, timing, spatial awareness—size, shape, distance, dimension, perspective, relationship; depth perception. These skills have a fused linkage with equipment controls so that operator and machine are one unit. Natural machine “savvy” causes this person to subconsciously *know* what the machine is capable of doing and operate it to get excellent performance. This usually includes proud identification, through one’s skills, with the equipment one operates. Work is most often outdoors or where conditions for physical comfort aren’t closely controlled. Mobility of work and residence is often another important factor.
- ⇒ A moderate motivation indicates that this person has talent for operating heavy, mobile equipment such as trucks, earth-movers, cranes, etc. Sensory/physical skills are involved and important: e.g., coordination, dexterity, timing, spatial awareness—size, shape, distance, dimension, perspective, relationship; depth perception. Because equipment operation is only moderately motivated, this person identifies more with the talent than with the equipment; i.e., it’s another job. Nonetheless, persons with natural mechanical savvy are always interested in tools, appliances, machines or equipment. Moderately motivated, this operator trait is probably not occupationally specialized.
- ↓ For one or more of a variety of possible reasons, low motivation indicates that this person is not interested in heavy equipment operation. It is sensory/physical work which requires a variety of talents. Study of Worker Traits in this narrative appraisal will show why equipment operation doesn’t fit this person’s vocational orientation.

Manipulate: physically manage material processes

4 Manipulate: Physically Manage Material Processes: to control and be responsible for moving, guiding or processing materials by use of sensory/physical abilities, tools, or equipment; involves some latitude of judgment with regard to what to process, how to process it, the end result, and quality of the process. It is a form of “management” because the core meaning of management is to manipulate.

Manipulate: physically manage material processes requiring responsibility for mental/ sensory/physical processing of things, which includes perception, planning, decisions and actions. This usually involves physical materials, often includes tools, and may or may not include operating or controlling machines. Key responsibility is deciding how to process materials for most effective outcomes.

- ↑ **Manipulating** is a special trait which can have a variety of important meanings depending on its interaction with many different traits. In the **things** context of this section, it means motivated ability to manage/ handle material processing which may or may not involve machines. Basically, it is combined mental, sensory and physical function tied to scheduling and processing of that which is “at hand”. A high motivation indicates that this person has that ability. (**note:** There can be other meanings to this trait. For instance: if all other mechanical or operator factors have low ratings, but **management of people** has high ratings (where listed in other Worker Trait Code sections), this factor shows that the person is motivated to **impersonally** manage (manipulate) people as **things at hand**, as a part of the process, to achieve management objectives.)
- ⇒ A moderate motivation indicates that this person has mental/sensory/physical talent for handling material processing. This may or may not involve machines or machine operation. It basically means motivation to manage (i.e. functionally manipulate) things at hand from one place to another, from one process to another, from one material state to a new one because of the process. This can be machine work, or craft work, or even supervising (bossing) the work of people.
- ↓ Low motivation indicates that this person is not interested in processing activities, no matter what is being processed or who is doing the processing.

Tending: monitoring/adjusting gauges, controls, switches

5 Tending: Monitoring/Adjusting Gauges, Switches, Controls: monitoring processes by means of measuring and recording devices such as computers, gauges, calibrating instruments, etc.; often involves adjusting materials or controls to keep that which is measured within specific ranges or limits.

Tending: monitoring/adjusting gauges, controls, switches required to observe and record instrumentation of industrial processes; usually operational, administrative or clerical; very often includes adjusting timers and temperature controls, turning switches on and off, turning flow valves, etc. on a schedules, volume or count basis.

- ↑ A high motivation indicates that this person is motivated and equipped for taking care of operational/clerical activities. This means monitoring on-going operational processes through observation of recording instruments which show what is currently happening. It usually involves more than just observing and recording what is observed. It often requires setting limits (such as temperature or flow controls), turning flow valves or switches on and of on a scheduled or situational basis. It includes responsibility for quickly noting when something is not happening as it should, and then taking immediate, appropriate action—including shutting down the process, or alerting technical or management personnel. This tending position does not imply or suggest *just* clerical observation and posting.
- ⇒ A moderate motivation indicates that this person is perceptive and alert relative to monitoring operational processes by use of technical recording instruments. This includes remaining interested, alert and responsible throughout steady operational shifts. This activity could appropriately be called operational/clerical because it means keeping tab on what is going on.
- ↓ Low motivation indicates that this person is not oriented toward routine, alert monitoring, recording and reporting of operational or machine processes. Such activity is too clerical for this person.

Feeding/offbearing: manual labor timed by machines

6 Feeding/Offbearing: Manual Labor Timed By Machines: sensory/physical work involving feeding of materials into machines or removing them from machines; the activity is determined and timed by the kind of material being handled and the requirements and speed of the machine. The person may or may not have some degree of responsibility for operation, adjustment or maintenance of the machine.

Feeding/offbearing: manual labor timed by machines requiring efficient, safe feeding materials into machines or offbearing materials from machines; assembly line activity.

- ↑ A high motivation indicates that this person is able to exercise sensory/physical skills in feeding materials into machines, or offbearing materials from machines efficiently and steadily. Such activity is usually associated with assembly line processing. First of all, it requires tireless synchronizing of one's sensory/physical activity with the speed and characteristics of machine input or output. It also means little social interactions with others while functioning on-station.
- ⇒ A moderate motivation indicates that this person has sensory/physical aptitude for feeding materials into machines or offbearing materials from machines efficiently and steadily. Such activity is usually associated with assembly line processing. It is important to review other Worker Trait factors to determine if and how long this person would want, tolerate, or cope with being locked in with machine-mandated performance. One must be content with this kind of activity before one can be satisfied by it.
- ↓ Low motivation indicates that this person's trait makeup is not compatible with assembly line activity where one is locked in to operational processes by station, function and timing. Such activity would soon be boring, tiring, frustrating and stressful.

Handling: basic, routine manual labor

7 Handling: Basic Routine Manual Labor: almost exclusively sensory/physical work to `handle' materials; may involve tools or equipment which require little judgment, training or skills; little or no latitude for judgment relative to what is done, how to do it, or when to do it. Work is specifically defined in basic terms and monitored as it progresses.

Handling: basic, routine manual labor requiring supervised or assigned routine sensory/physical labor which may or may not include tools, machines or equipment; usually basic, repetitive activity following rules, guidelines or procedures.

- ↑ A high motivation indicates that this person is well equipped for activity involving craft tools, repetitious activity, recognizable detail, variable physical conditions (temperature, elements, etc.) and minor tangible problem solving. This work is often called manual labor or basic labor to indicate that it can be done with minimum skill, training, instruction or supervision. It is very often associated with a helper position and role.
- ⇒ A moderate motivation indicates that this person has aptitude for manual labor or basic labor activities which involve easily used craft tools, repetitious activity, recognizable detail, outdoor physical exposure, and minor problem solving. It is most often a helper position which can be handled with minimum skill, training, instruction or supervision. Please note the word aptitude which means ability to do something—with no mention or inference about whether the person wants to do it, or gains satisfaction from it. It is, therefore, necessary to see other Worker Traits to determine if such work is satisfying for a moderate motivation indicates that this person on a steady basis.
- ↓ Manual labor is not an acceptable activity for this person. Routine, elementary, sensory/physical activity is not motivating; instead, it probably is experienced as boring, frustrating, and stressful.

Data: Priority and Preference of Mind Activity

The *data* section identifies talents and priorities for certain kinds of mental activities. If interests and talents are primarily intellectual, academic, scholarly, scientific, mathematical, or professional, this may be the most important section of the Worker Trait Code System for the person appraised. If his/her talents are not primarily mental, this section may have little value. If these factors are important for this profile, then factors in the *reasoning*, *math*, and *language* sections will also be both relevant and important.

The 7 measured Worker Trait Codes are:

0	Synthesize: holistic, conceptual, strategic thinking	1
1	Coordinate: plan, implement, manage procedures	2
2	Analyze: investigate, research, experiment	1
3	Compile: gather, classify, store information	1
4	Compute: solve routine mathematical problems	1
5	Copy: duplicate, transcribe, record, send	1
6	Compare: recognize important factors for use	1

Synthesize: holistic, conceptual, strategic thinking

0 Synthesizing: Holistic, Conceptual, Strategic Thinking: holistic/conceptual awareness of the essential nature (essence) of things; natural exposure to ideas, concepts, symbols, theories, hypothesis, options, then “making sense” of that information in a holistic context.

Synthesize: holistic, conceptual, strategic thinking: required to conceptually, holistically sense, see the big picture; consciousness of the essential nature of that which is perceived or thought; adept and comfortable with abstract ideas, concepts, theories, options, strategies. This trait is necessary for executive, consulting, research, scientific and/or strategic activities.

- ↑ “**Synthesize: putting two or more things together to form a whole; the combination of separate elements of thought into a whole; the operation by which divided parts are united.**” Webster. A high motivation indicates that this person sees the big picture, attempts to see all parts of the picture in that larger context, then sees all parts relative to each other—but still within that larger context. Perception and thinking are therefore holistic and conceptual. Philosophical and intuitive processes are involved. Scientific, managerial and/or literary talents may also be involved. Other mental factors in this section are subordinate, secondary, or complementary to this primary function. This is an overview and scanning activity which includes ideas, concepts, theory, fiction, hypothesis and assessment. (Note that words in the last sentence are unrelated to logic which Webster defines as “the science of the operations of the understanding subservient to the estimation of evidence.”) Synthesis gets no further toward logic than estimating.
- ⇒ Along with other mental activities and priorities, moderate motivation indicates that this person sees the big picture; or assembles perceptions, thoughts, information, data, numbers, etc. in the context of the big picture. It is important to determine, by scanning other factors in this **data** section, how important synthesizing is relative to other mental processes—regarding **analyzing**, **comparing**, and **coordinating** in particular. That determines whether moderate motivation indicates that this person **starts** with the big picture, or builds up to it later.
- ↓ Low motivation indicates that this person’s mental orientation is factual, realistic, logical handling of that which is directly related to knowledge and experience. This person wants proof—like biting a nickel to see if it is made of wood or metal. Fantasy, fiction, abstract ideas, theory and hypothesis are not a part of this person’s mental territory. Low motivation indicates that this person functions on the basis of logic, reasoning, talent-based savvy or sensory/physical abilities. Because this person does not function on the basis of the big picture, it is important to determine, from review of all Worker Traits related to mental activity, which piece or pieces of the picture have primary influence.

Coordinate: plan, implement, manage procedures

1 Coordinate: Plan, Implement, Manage Procedures: manage, expedite, coordinate and/or operate; determining time, place, process and sequence of operations or action to be taken; it literally means to identify utility, then utilizing by controlling and manipulating on the basis of what is to be done and what is to be achieved.

Coordinate: plan, implement, manage procedures required as a mental function, this calls for ability to identify what must or could be done, identify instrumentality or utility of that which can be coordinated (managed, manipulated), assume functional control and management responsibility to achieve procedural objectives. One must manage on the basis of the big picture, or pieces of the picture, or both depending on what the job requires.

- ↑ A high motivation indicates that this person is strongly motivated to **coordinate**: to take action, to manipulate that which is at hand in order to get the show on the road. Because this trait is strongly motivated, it is very important to see the other factors of this **mental activity** section, and also the **mental priority** section, to determine whether this person has first seen the big picture, pulled in important pieces of the picture, made plans and developed strategies **before** taking action. If coordination is the top priority, it becomes a “General Patton syndrome”—begin the charge, then identify the objective, and hope that someone follows with the supplies. If this trait is equally motivated with other mental traits, it still means enthusiasm and drive to take action, but it is balanced with other related functions. ***This trait is goal oriented!***
- ⇒ A moderate motivation indicates that this person is motivated to coordinate (i.e. manage, manipulate, administer, etc.) that which is at hand to achieve planned, known or strategic objectives. This means that this person intends to do something functional, directional and goal-oriented with thinking processes, decisions, and actions. When and how this person coordinates can be determined by reviewing factors in the **interest, temperament, data, and reasoning** sections of the Worker Trait Coding System.
- ↓ Low motivation indicates that this person is not motivated to lead, manage, coordinate, manipulate or administratively control processes. Therefore, mental activity tends to be independent of strategic, competitive, operational or administrative management or manipulation. Thinking tends to be an end in, and of, itself, and possibly somewhat distant from direct, functional applications.

Analyze: investigate, research, experiment

- 2 Analyze: Investigate, Research, Experiment:** logically identifying, comparing and evaluating the contextual relation of parts to the whole, or relation of parts to parts in the context of the whole; working toward options and alternatives relative to the evaluation of that which is ‘at hand’. This is not synthesizing; it is not just comparing; nor is it computing.

Analyze: investigate, research, experiment required to analytically look for relationships, utility, strategies and options relative to the big picture, pieces of the picture, or pieces relative to pieces in the context of the big picture; develop understanding of what can be done with what is at hand. This is not intuition; neither is it computation. It is in between. It includes curiosity and innovation.

- ↑ A high motivation indicates that this person is curious, inquisitive, investigative, exploratory, analytical, and experimental. Words such as *if* and *why* are central to this trait. It is a factor which fits exactly between *synthesizing* and *comparing*—with emphasis on Synthesizing. Analysis is more than seeing the big picture, or seeing *how* the pieces fit the big picture. It includes non-linear speculating about new forms, possibilities, relations and fits. In other words, it tends to be an executive function dedicated to possibilities.
- ⇒ A moderate motivation indicates that this person has analytical, research and innovative talents. Mental activity has an objective of new breakthroughs, innovative pathways, and achievement of developmental progress. It is important to determine where this analytical a part of mental activity fits with other mental traits and their priorities. It assures that this person is open to new ideas and also motivated to identify the usefulness of those ideas.
- ↓ Low motivation indicates that this person is not oriented toward analytical, exploratory or investigative activities. This is suggestive of one of three other mental orientations, or the combination of two of those:
- (1) Imaginative, creative, abstract perception and thought (rather than logic per se);
 - (2) methodical, linear computation or reasoning; or
 - (3) natural, subconscious savvy directly connected with sensory or sensory/physical talents.
- It is important to determine, by reviewing all Worker Trait Code sections, which of those orientations fit this person.

Compile: gather, classify, store information

3 Compile: Gather, Classify, Store Information: gathering, collating or classifying information of many kinds from many sources; a very important skill and function in database management; sorting, classifying, storing, retrieval, publishing, and distribution are very often a part of this activity.

Compile: gather, classify, store information requiring the ability to perceive, recognize, sort, retain and recall useful information; administrative, clerical, procedural assembly of useful data and detail; important for data-base information systems, planning, consulting, engineering, etc.

- ↑ **Compiling** means more than simply gathering arm's full of data sheets and stuffing them in a filing cabinet. It means that this person is motivated to currently find, identify, classify, store, remember and retrieve what is important, or what might be important, for future use. This is crucial for researchers, technical writers, lawyers, academic teachers, consultants, systems engineers and programmers. It tends toward being a pack rat orientation.
- ⇒ A moderate motivation indicates that this person is conscious of the importance of information and evidence relative to the whole story of a subject or topic. Along with that perception, there is a natural sorting process of separating what is important from what is trivial. A moderate motivation indicates that this person is deliberate, methodical and thorough in compiling, labeling and storing information for later use.
- ↓ Low motivation indicates that this person is not naturally attentive to detail and does not like clerical or administrative activities. If information is saved for future reference or use, it is quite likely that it will not be remembered, or its location will be forgotten. This person remembers information in general terms relative to the main theme or subject.

Compute: solve routine mathematical problems

4 Compute: Solve Routine Mathematical Problems: performing primarily arithmetic operations to perform what is commonly called business math: calculations to solve or process on-going administrative or operational ‘problems’. Theory is not involved; neither is posting per se; it is unlikely that statistics are involved.

Compute: solve routine mathematical problems required to calculate routine, logical, administrative, procedural or operational problems; numerical and/or monetary activities with emphasis on records and reports.

- ↑ A high motivation indicates that this person is motivated and talented for routine, factual mathematical problems related to operational, procedural or administrative activities. This includes good logic, analysis and attention to detail. Business math may be motivated strongly enough to be the heart of professional or vocational activity—as corporate accounting, etc.
- ⇒ A moderate motivation indicates that this person is very capable in handling and solving routine, factual mathematical problems. This is valuable talent for operational, technical, processing or administrative activities. When interacting with other traits, as it does here, this trait has application value in many areas.
- ↓ Routine, factual mathematical problem solving is not of interest to this person. Therefore, math is probably not a well, or willingly, developed skill, and it should typically not be a significant part of vocational responsibilities or activities. Study of all Worker Trait factors, particularly those in the *mathematical capacity* section, will identify why this is not a particularly motivated activity.

Copy: duplicate, transcribe, record, send

5 Copy: Duplicate, Transcribe, Record, Send: processing and duplicating hard-copy information for multiple use. It may be more than manual, i.e., using sophisticated copiers. This can also mean activities like posting (taking inventory) or processing mail (applying postage). Most of the process is sensory/physical, plus attention to detail.

Copy: duplicate, transcribe, record, send; required to duplicate by sensory/physical skills; use of computers or specialized machines for publishing graphic information; visual, graphic skills; use of copiers, cameras, projectors, etc.

↑ A strongly motivated **copy** trait means more than laying a paper face down in a copy machine and pushing buttons. It includes:

- (1) awareness of spatial measure and layout: size, shape, dimension, perspective;
- (2) artistic ability for factual image reproduction;
- (3) attention to detail;
- (4) awareness of machine function and use; and
- (5) tolerance of (or preference for) routine.

This is an asset for database management, administrative work, warehouse processing, or library activities. It is particularly valuable for persons operating printing or copy shops—or persons involved in publishing with computers.

⇒ A moderate motivation indicates that this person has talent for reproducing images, information, etc. by machine operation and/or graphic skills. This **copy** activity involves detail and routine. It is an asset for database management, computer publishing activity, administrative work or library work, and/or warehouse processing.

↓ Low motivation indicates that this person is not interested in mail room activities; i.e., duplicating and processing forms, bulletins, envelopes, etc. Detail and routine are avoided; as are activities related to detail and routine.

Compare: recognize important factors for use

6 Compare: Recognize Important Factors For Use: specifically identifying each thing, then comparing it with other things; perception and analysis of the relationship of parts with parts, sometimes relationship of parts to the whole; assessing similarities, differences, tolerances, quality, etc. This is very often a function directly interactive with *Synthesizing* and *Analyzing*; if so, it means comparing pieces of the picture with the big picture. (See *P, Sensory/Mental Awareness of Pieces of The Picture in the Aptitude For the Job section*.)

Compare: recognize important factors for use required to see importance and utility of pieces of the picture; analyze and match fact, data, procedures, systems; fit pieces of the picture into the big picture—or fit pieces with pieces in the context of the big picture.

- ↑ A high motivation indicates that this person has excellent skill for identifying factors which are important for vocational use. **comparing** includes
- (1) awareness of the context (big picture) in which the factor or factors would or could fit;
 - (2) relationship of the factors to other factors within that larger context;
 - (3) new possibilities of linkage or relationships of factors to the big picture; and/or
 - (4) new possibilities of linkage or relationships of factors with factors in a new context.
- This is an important Worker Trait for research, technical activities, systems engineering, operations management, and administrative activity. Many trait combinations can be involved in this activity: *scientific, literary, tangible problem solving, visual-artistic, philosophical, and managerial*. It is important to identify which of those traits are involved in this perceptual/mental activity.
- ⇒ A moderate motivation indicates that this person has ability to recognize and identify (or classify) important factors related to the context, content, operations and objectives of projects. Emphasis is on *utility*. This is an important Worker Trait for research, technical activities, systems engineering, operations management, and administrative activity.
- ↓ Low motivation indicates that this person is not curious about where things could be used, where they fit, or how they could be fit together in new ways. Instead, things are seen as they are, in abstraction, without regard to linkage or relationship with other things.

Reasoning: Mental Processes Required By Job

This *reasoning* section is closely linked with the *data* section. The *data* section identifies an individual's priorities (high and low) for ways of thinking, while the *reasoning* section focuses on *where*, *why*, and *how* this thinking will be applied. Just like the linkage between the *interest* and *temperament* sections, *data* and *reasoning* are coupled very tightly.

The 6 measured Worker Trait Codes are:

1	Follow specific directions for basic, routine tasks	1
2	Methodical and thorough in routine procedures	1
3	Operational systems, procedures, maintenance	1
4	Solving on-going problems in familiar areas	1
5	Apply ideas and strategies to real problems/tasks	1
6	Holistic concepts, meanings, options, strategies	1

Follow detailed directions for basic, routine tasks

1 Follow Specific Directions for Basic, Routine Tasks: read or hear instructions and do exactly as told. This is not “guidelines” where one uses discretion within specific parameters; instead, it prescribes exact by-the-numbers procedures. Accurate compliance is more important than judgment or individual discretion.

Follow detailed directions for basic, routine tasks requiring common sense to carry out simple instructions for routine tasks in a familiar environment. This primarily calls for ability to read, remember and repeatedly apply simple instructions and explanations. Routine and detail are important.

- ↑ A high motivation indicates that this person is capable of carrying out instructions for simple, routine tasks in a familiar environment. Many maintenance positions are in this category, as are some temporary or seasonal jobs. Usually tasks are explained, demonstrated, and supervised. Key responsibilities may include dependability, a steady work record, thorough and clean performance, and trustworthiness relative to the property of others.
- ⇒ A moderate motivation indicates that this person can be counted on for satisfactory performance in simple, routine tasks in a familiar environment. This means hearing or reading exactly what was said, and doing as instructed. This is a good trait for operational, administrative, or clerical activities.
- ↓ Low motivation indicates that this person is not motivated or oriented for accomplishing simple, routine, basic tasks. (Few people are.)

Methodical and thorough in routine procedures

2 Methodical and Thorough in Routine Procedures: this is “administrative” activity. It includes clerical activity, but it is not just clerical. Methodical means that persons are not just doing the work, but are monitoring and tracking what they are doing so nothing is missed, lost or misdirected.

Methodical and thorough in routine procedures required to apply common sense to carry out detailed, but non-complex, non-technical written or oral instructions; few variable or complexities; i.e., “go by the book.”

- ↑ A high motivation indicates that this person seeks, needs and enjoys occupational activity which is exclusively methodical, thorough, and routine. That kind of activity may require mental attention, focus and concentration. On the other hand, it may not. In many **very repetitious** activities, a worker literally delivers one’s body (i.e. sensory/physical system) to a specific work-site, turns that “system” on to function “automatically” (i.e. subconsciously)—trusting that it will keep on running while the mind “takes off elsewhere” and comes back at quitting time to take the physical system (body) home—**and it is that kind of person that can do that job best, most accurately and safely, for the longest time, and get the most satisfaction from it.** Many assembly line operations would have to shut down without this kind of person.
- ⇒ For this person, it is natural and comfortable to “get into the swing of things” and “go with the flow”. Ability to become synchronized with operational flow can be the result of many trait combinations, the most likely being mechanical “savvy”, attachment to the familiar, and attention to detail—plus certain NON-motivated “social” traits. It is likely that moderate motivation indicates that this person is motivated in methodical, thorough, and routine activities as long as those activities are a necessary part of more strongly motivated interests. (**note:** many people like methodical, meticulous, routine activities as “a break” or departure from vocational activities which call for constant change, variety, quick decisions, risk, etc.)
- ↓ Methodical, meticulous, routine activities are not motivated, acceptable, or tolerable for this person. Work must have change, variety, options, challenge, and opportunity to move up on the basis of talent or merit.

Operational systems, procedures, maintenance

3 Operational Systems, Procedures, Maintenance: “If it ain't broke, don't fix it.” This is pre-problem fixing so problems don't happen. It is not just maintenance; instead, it is tune-up activity which requires persons to stay on top of operational systems or procedures. It requires thorough knowledge of the *Operation* of systems as well as *Knowledge* of systems per se; i.e. it requires feel as well as savvy in order to ‘sense’ what is going on. Someone talented in this activity relies on a great amount of subconscious/sensory *know-how*.

Operational systems, procedures, maintenance requiring technical, systematic, logical design of operational or automated procedures; develop plans, schematic or sequential instructions in written, oral or diagrammed form; to automate processes for maximum efficiency.

- ↑ A high motivation indicates that this person has basic interest in, and understanding in operational aspects of systems, procedures, and/or maintenance. There is an associated aptitude toward the use of “common sense” in understanding and carrying out instructions or explanations of systems procedures and/or maintenance in written or oral form, by diagram or illustration, in technical or elementary terms. It also assumes that this person is comfortable and satisfied with being a “caretaker” for systems such as power generating units, city water or traffic systems, control tower activity at an airport, adjusting and maintaining machines on an assembly line, and computer, fax, or phone network installations.
- ⇒ A moderate motivation indicates that this person has basic interest in, and understanding in operational aspects of systems, procedures, and/or maintenance. Because this person has only motivation for an activity which is based on repetition (in both function and time), it is likely that tenure will not be for “the long haul” unless this person seeks, needs or enjoys stability and routine. Aptitude for an activity does not guarantee the motivation for it.
- ↓ Low motivation indicates that this person literally gets “system claustrophobia” if “stuck” with prolonged involvement in running, monitoring, or maintaining systems. It may be experienced as boring, frustrating, and quite stressful. It could eventually lead to the proverbial question of which will have the first breakdown—the system or this person.

Solving on-going problems in familiar areas

4 Solving Ongoing Problems in Familiar Areas: this can be called troubleshooting because it is maintenance activity: (a) things should be running right, (b) but something happened to cause a malfunction, and (c) it is necessary to restore procedures, systems, operations, etc. to normal status. The problems have probably occurred before; therefore, the solutions are also known.

Solving on-going problems in familiar areas required to apply rational formulas, rules, systems and/or procedures to deal with concrete problems where standardization exists. Quality, efficiency, production and maintenance are activities for application of this Worker Trait.

- ↑ A high motivation indicates that this person uses and applies rational formulas, rules, systems and/or procedures to deal with concrete variables where only limited instructions or guidelines exist. Emphasis here is on **solving** operational or administrative **problems** which have currently developed in **familiar** areas. This is commonly known as trouble-shooting. The objective is to get the train back on the track. This requires on-site familiarity with operations, a “sense” or suspicion of where things might or could break down, and savvy about ways to fix the problem.
- ⇒ A moderate motivation indicates that this person is motivated and equipped for trouble shooting—to recognize or otherwise identify problems or developing problems in familiar operational or procedural areas; to tackle problems with intent to solve the problems and restore function to former levels or better. This requires on-site familiarity with those operations, a sense or suspicion of where things might or could break down, and savvy about ways to fix the problem.
- ↓ Low motivation indicates that this person doesn’t want problems, or problem solving responsibilities. Management responsibilities for problem solving is avoided even more. Low motivation indicates that this person assumes or hopes that things will go on without problems. When problems arise, they may be experienced as frustrating and stressful.

Apply ideas and strategies to real problems/tasks

5 Apply Ideas and Strategies To Real Problems/Tasks: innovation and experimentation attempt to achieve breakthroughs in improving or upgrading currently operating systems or procedures to a next higher level of performance. New problem solving is blended with known problem solving. It is thoroughly knowing how things are working now, making things function as effectively as possible, but still having ideas about causing them to function better in new ways. It is sticking with a procedure until insight, hunch, or savvy comes up with an idea. This is not the same as the item above (6) which relies on intuition, creativity, and totally new approaches to doing things.

Apply ideas and strategies to real problems/tasks requiring analytical, scientific and/or technical thinking to identify, explore, define problems, options and/or challenges relative to existing problems, situations, and needs; collect information, establish facts, figure pragmatic solutions, determine appropriate action; connect abstract and concrete variables.

- ↑ Scientific/technical/logical thinking is applied by this person to identify, analyze and solve challenges and/or problems; to collect data, establish facts, connect abstract and concrete variables, draw valid conclusions, determine appropriate action, devise strategies and systems to achieve objectives. This is engineering in the industrial and technical sense.
- ⇒ A moderate motivation indicates that this person has a mind oriented toward systems engineering—identifying, analyzing and solving challenges and/or problems by collecting data, establishing facts, connecting abstract and concrete variables, drawing valid conclusions, determining appropriate actions, and devising strategies and systems to achieve objectives. *Many* traits are involved. Systems engineering is moderately motivated for this person, so all of those traits are not strongly or equally motivated. Review of all Worker Traits will identify which area or areas of engineering are motivated and talented for this person.
- ↓ Systems and technical strategies are not a part of this person’s mental skills. Perception and thinking do not *see* life, situations or *things* as jig-saw puzzles that are to be taken apart, analyzed and then put back together—especially if they aren’t in the same place as before. Low motivation indicates that this person sees things as they are and for what they are without curiosity or questions.

Holistic concepts, meaning, options, strategies

6 Holistic Concepts, Meanings, Options, Strategies: pioneering mental orientation which looks for possibilities through awareness of ideas, concepts, theory, hypothesis, options, and strategies. “Phenomena and events in the real world do not always fit a linear model. Hence, the most reliable means of dissecting a situation into its constituent parts and reassembling them in the desired pattern is not a step-by-step methodology such as systems analysis. Rather, it is the nonlinear thinking tool, the human brain. True strategic thinking thus contrasts sharply with the conventional mechanical systems approach based on linear thinking. But it also contrasts with the approach that stakes everything on intuition, reaching conclusions without any real breakdown or analysis.”¹

Holistic concepts, meaning, options, strategies requiring thinking applied to the big picture, progressive solutions of current problems, and/or future possibilities or breakthroughs; work with abstract variables and new options; non-linear thinking. This includes intuition, hunches, ideas, concepts, theories, assessment and choice of options, strategies.

- ↑ A high motivation indicates that this person is strongly motivated to apply thinking to the big picture through holistic ideas, concepts, options and strategies. This does not mean, suggest or imply that thinking is kept only in a holistic context; but it does mean that the first and constant priority and focus are on the big picture. (Example: a high motivation indicates that this person is more inclined to be an executive than a manager, more inclined to be a manager than a supervisor.) Pieces of the picture are brought in to the big picture.
- ⇒ A moderate motivation indicates that this person’s mental orientation includes holistic and conceptual thinking, awareness of the essential meaning of things, ability to deal with abstract variables, consideration and selection of options. The big picture is kept in mind as this person works with ideas, plans, or activities.
- ↓ Low motivation indicates that this person works with facts and tangibles. Intangibles, abstract ideas, theories and hypothesis are not demonstrable vocational skills. Plans, schedules, and processes are the kinds of things that this person can get a handle on and use.

Mathematics: Math Function Required By Job

Math is a talent like art or music. In most instances, you have it or you don't; you like it or you don't. If the individual has talent for math, this section shows where the greatest interest and motivation occurs—and that is where he/she has probably developed the most talent. Low ratings for some or all of these factors, imply that math, or possibly that specific application of math, is not attractive to this individual.

The 6 measured Worker Trait Codes are:

1	Counting/Posting: inventory, data processing	1
2	Elemental: add, subtract, multiply, divide	1
3	Computational: solving routine math problems	1
4	Analytical, accounting, auditing use of math	1
5	Statistical, investigative mathematics	1
6	Research: innovative, experimental use of math	1

Counting/posting: inventory, data processing

1 Counting/Posting: Inventory, Data Processing: tabulating or processing numbers to have a record of things done or things on-hand. Accuracy of count is the primary activity. Calculations are either not a part of the activity, or a minor a part.

Counting, posting: inventory, data processing, required for warehousing, shipping, customer bill processing; data processing; recording, simple addition and subtraction.

- ↑ A high motivation indicates that this person has excellent perception of detail and the ability to accurately create and process records related to that detail. This ability to steadily, consistently and accurately identify and process detail relies on conscious and subconscious talent, the latter in particular. Emphasis here is on detail related to data and numbers. This is a valuable asset in many occupations such as pharmacist, registered nurse, transportation and distribution, switchboard activity, data processing centers, etc.
- ⇒ A moderate motivation indicates that this person is naturally aware of, and attentive to detail in perception, recording and processing. This is a valuable asset in many occupations such as pharmacist, registered nurse, transportation and distribution, switchboard activity, data processing centers, etc.
- ↓ Low motivation indicates that this person is not oriented toward verbatim perception, recording and/or processing of details, especially numbers.

Elemental: add, subtract, multiply, divide

2 Elemental: Add, Subtract, Multiply, Divide: “making change” in commercial activities; i.e., simple arithmetic for activities such as figuring bills in stores or restaurants, depositing or paying money at bank or savings-and-loan counters

Elemental: add, subtract, multiply, divide requiring basic arithmetic; figure totals, balances, inventory, postage, change, etc.

- ↑ A high motivation indicates that this person is deliberate enough, concentrates enough, figures enough, and watches detail enough to be able to add, subtract, multiply and divide—**and come up with the right numbers**. For some bright people, this is hard to do—or very unlikely to happen (e.g., dialing a phone number, or putting the right address on an envelope).. Transposing numbers may a problem for some persons, so they don’t rate well for this Worker Trait.
- ⇒ A moderate motivation indicates that this person has a good head for numbers—adds, subtracts, multiplies and divides—and comes up with the right numbers each time. Some assume this is natural for all persons. In reality it isn’t so.
- ↓ Low motivation indicates that this person will tend to be less than accurate or consistently correct when making basic arithmetic calculations. While possibly quite capable of such actions, it may simply be a lack of interest or the motivation to express oneself vocationally through the use of basic math skills.

Computational: solving of routine math problems

3 Computational: Solving Routine Math Problems: “number crunching” for such things as payroll, selling, purchasing, billing, taxes, insurance, etc. Much of this kind of math can be programmed for automatic computer processing.

Computational solving of routine math problems requiring basic business mathematics; accounting, bookkeeping procedures to record and document business transactions and activities; involves forms, reports, decimals, fractions, percentages.

- ↑ The Worker Trait factor called “computational” should be called “business math” because it means everyday calculations related to over-the-counter or on-site business calculations or transactions. It means figuring commercial transactions like buying groceries at a store, lunch at a restaurant, or a plane ticket at an airport. It is primarily addition, subtraction, multiplication, division and recording results. High rating for this math Worker Trait shows that this person is motivated and equipped for computational math.
- ⇒ A moderate motivation indicates that this person has good talent for business math related to commercial calculations and transactions—which means competency and accuracy with addition, subtraction, multiplication and division.
- ↓ Low motivation indicates that this person doesn’t like routine, basic mathematics oriented activities, and prefers not to work with math, nor depend on math skills in occupational activities.

Analytical, accounting, auditing use of numbers

4 Analytical, Accounting, Auditing Use of Math: math for operational use: recording work done; analyzing operational numbers for various management or administrative reasons (such profit/loss statements or budgets); using math for making business forecasts, bids or strategy

Analytical, accounting, auditing use of numbers requiring the use of numerical information for planning, budgeting, auditing, estimates, bidding, etc. Data-based management information systems and systems engineering fall within this domain; It is strategic and operational use of numbers instead of theoretical, computational or clerical mathematics.

- ↑ **Accounting control of numbers** is management math because it is *used* by management for tracking, analyzing, and verifying business activities and performance. A high motivation indicates that this person has a management math orientation because it includes a specialized talent for managing with math—i.e., making management decisions with knowledge gained from this level of mathematical activity. This includes budgets, operationally-based forecasts, competitive risk analysis, etc. Chief Financial Officers, Comptrollers, bank officers, and auditors rate high for this trait.
- ⇒ A moderate motivation indicates that this person is motivated and equipped to work with, use and apply math at management levels for tracking, analyzing and proving business activities and performance. This is a part of a management generalist orientation.
- ↓ Low motivation indicates that management responsibility based on mathematical calculations and decisions is *not* a desirable activity for this person.

Statistical, investigative mathematics

5 Statistical, Investigative Mathematics: math used to prove, validate, or confirm other math by using acceptable procedures such as statistics. Emphasis is on premise, basis, criteria, method, evidence, repetition, and confirmation. It is research follow-up rather than research spearheading and tends to be a shared process rather than an individual pursuit.

Statistical, investigative mathematics requiring use of mathematics to support, confirm, validate research, experimental or investigative mathematics; use of mathematics for measurement of probabilities, mean, standard deviation, etc.

- ↑ Statistical, investigative USE of mathematics fits this person’s mental orientation and capacity. This kind of math is valuable for many kinds of “engineering” activities—mechanical, systems, hydraulic, geological, computer, etc. Methodical, logic, pragmatism, and objectivity are central to the activity. Computers are typically essential for this work.
- ⇒ A moderate motivation indicates that this person is methodically curious, exploratory, analytical and systematic—with math as a primary or important tool for such activity. Math is not an end in itself, but used more as a “tool” as just stated. “Proof” is a major priority of thinking.
- ↓ Statistical and/or investigative kinds of math are too esoteric for this person’s math orientation and capacity. Arithmetic and business math may be in the range of “aptitude” which can be determined by review of related Worker Traits.

Research: innovative, experimental use of math

6 Research: Innovative, Experimental Use of Math: Regardless of the kind or level of math being used, this factor identifies minds capable of creating new mathematical ideas, hypothesis, theories, applications, formulas. It is inventive, creative, innovative, or experimental math.

Exploratory, innovative, experimental use of math required to work with a wide variety of theoretical mathematical concepts; make original application of those concepts; apply knowledge of advanced mathematical techniques to new areas of challenge or research.

- ↑ A high motivation indicates that this person can work with a wide variety of theoretical math concepts; make original application of those concepts; apply knowledge of advanced mathematical or statistical techniques to new areas of challenge, interest or opportunity. This mind is conceptual, analytical, curious, and exploratory. This represents an appropriate mind for research and theoretical logic.
- ⇒ A moderate motivation indicates that this person has math capability extending toward theory, abstract concepts, experimental applications, etc. Because motivation for this theoretical activity is moderate, it is not likely that it would be satisfying as a primary vocation, or have too heavy emphasis. However, it remains a valuable asset which extends capability beyond usual activities.
- ↓ Theoretical, abstract math is not of much interest to this person—and perhaps math itself isn't of much interest. Review of all factors in this section will identify *if* and *where* low motivation indicates that this person might have math interest and talent applicable to occupational activities.

Language: Literary & Communicative Requirement

Four *Language* traits are included in the narrative to cover basic activities which use words. They aren't very specific—but there are related factors for literary, journalistic, and communicative activities in the *Interest, Temperament, Data, People, Aptitude*, and *Reasoning* sections. If a high rating exists for one or more factors in this section, scan those other sections to discover talents the individual has for those activities. Not all jobs call for orators or authors, and some jobs require such skills.

The 4 measured Worker Trait Codes are:

1	Read, understand, follow basic instructions	1
2	Record, transmit, post, file information	1
4	Systematic, logical explanation and education	1
6	Creative literary, communicative ability	1

Read, Understand and follow basic instructions

1 Read, Understand, Follow Basic Instructions: understand and remember simple, basic communication and/or instructions. This is communication which is probably not higher than a fifth grade comprehension level. Remembering exactly what was written or said is the key element of this factor.

Understand and follow basic instructions required to understand basic rules, instructions, guidelines or demonstrations; write brief identifying information such as name, address, product, weight, cost, etc.

- ↑ A high motivation indicates that this person has ability to carefully, thoroughly read simple explanatory or instructional statements (like the directions on the label of a soup can) and fully/accurately know what was said. This is not a widely shared trait. Unless the subject attracts the reader’s attention in the first place, reading of elementary instructions is just “scanning”—and some information is probably overlooked, ignored, or bypassed. A high motivation indicates that this person should use this talent as an important vocational asset.
- ⇒ A moderate motivation indicates that this person has the ability to read elementary statements or instructions and have good recall of specific contents. This talent is an asset when it interacts with other talents.
- ↓ Low motivation indicates that this person does not give particularly close attention to non-motivated information, data, or detail such as elementary and basic instructions. The assumption may be to simply use common sense, or to experiment, in order to figure it out.

Record, transmit, file, post information

2 Record, Transmit, Post, File Information: gather, record, classify, departmentalize, store, retrieve and distribute information. It can be database management, library processing, administrative or clerical activity related to words and data.

Record, transmit, file, post information requiring data entry and retrieval; copy data from one record to another; record for rough draft or corrected copy; interview for information.

- ↑ A high motivation indicates that this person is talented for word processing in its widest application: administrative, secretarial, editing, library referencing, management information systems, electronic transmission of information, etc. It requires knowledge of proper language usage, spelling, punctuation, key-word identification, referencing and cross-referencing. Attention to detail is essential.
- ⇒ A moderate motivation indicates that this person has talent for gathering, processing, recording, transmitting, filing and/or retrieving information. Key talents are knowledge of proper language usage, spelling and punctuation; referencing, filing and retrieval abilities; and attention to detail.
- ↓ Low motivation indicates that this person has little interest in technical information management. There is seemingly too much detail, routine and paper work to maintain interest beyond a brief period of time.

Systematic, logical explanation & education

4 Systematic, Logical Explanation and Education: topical explanations which fully explain and inform; ability to outline a topic, formulate sequential explanation to cover all essential parts, and reach a logical conclusion. The objective is to teach or explain.

Systematic, logical explanation and education required to describe, explain, clarify, teach, illustrate; interpret and simplify technical writing as well as drawings and specifications; primarily applied in teaching, journalism, consulting, counseling, computer programming, systems engineering, etc.

- ↑ A high motivation indicates that this person is motivated to describe, explain, teach, illustrate, and interpret. This is a journalistic trait dedicated to inform people. Social, leadership, influential, technical, service, and functional traits are involved. It is therefore necessary to review all Worker Traits to more closely identify this person's orientation relative to this trait.
- ⇒ A moderate motivation indicates that this person has talent for systematic, logical explanation and education. This rating is based on the complementary interaction of a number of traits: social, leadership, influential, technical, service and functional. Review of all Worker Traits will identify this person's specific journalistic orientation.
- ↓ Low motivation indicates that this person has little interest in vocationally doing commercial, professional, or educational writing.

Creative literary, communicative ability

6 Creative Literary, Communicative Ability: creative imagination expressed in words; ability to have new ideas, concepts, plots, etc.; gifted for writing fiction, mysteries, and innovative ways or words to explain things. Poetry, lyrics, and drama fit in this classification.

Creative literary, communicative ability requiring creative writing, reporting, editing for publication or professional presentation; writing for books, newspapers, magazines, technical journals; prepare and deliver lectures or speeches.

- ↑ A high motivation indicates that this person is highly motivated and talented for creative writing and communicating at professional levels. Mind orientation is holistic, conceptual, imaginative, and creative. Ideas trigger more ideas. High rating for this Worker Trait indicates an interactive combination of literary and philosophical traits. Potential includes writing fiction, poetry, scripts for movies or television, advertising copy, marketing copy, teaching creative writing, etc.
- ⇒ A moderate motivation indicates that this person has creative writing and communicating abilities that are important vocational assets. Mental orientation is holistic and conceptual—and includes abstract ideas, concepts, theories, capacity for fiction and symbols. Writing is probably not a specialized or professional activity, but, it could be in particular area. Other Worker Traits should be screened to determine where and how this writing and communicative skill fits into this person’s vocational orientation.
- ↓ Writing and spokesperson activities are not motivational for this person. A job which demands creative writing skills most likely will be experienced and perceived as quite stressful and unsatisfying.

◆ Educational Analysis

David E. Barbee, Ph.D., Educational Technology, must be given credit for the inspiration, ideas, and specifics in the Educational Analysis section of MAPP. Dr. Barbee designed a complete educational system based on the “the motivational characteristics and learning styles” of each student. His educational system design has much in common with the MAPP system. This becomes evident when the root meaning of education is considered: “Education: To draw out the natural powers.” The Educational Analysis section of MAPP identifies the natural powers (i.e. “motivational characteristics and learning styles”) of an individual. Schools and teachers can actually know the individual and his/her learning preferences before the teaching begins and be able to design the educational paths which fit each student.

Mental Orientation

Perceptual/Sensory: Consciousness which is almost exclusively sense oriented. It includes one or more of the following traits: visual, auditory, mechanical, natural. A great share of trait development, ability and activity is subconscious—what is commonly called ‘natural talent’.

Intuitive/Impulsive: the combination of sensory and philosophical traits which are *not* accompanied by analytical, computational, clerical or routine traits. The person operates on feeling, hunches, intuition and impulsive motivation. He/she feel the urge or reluctance to do things, but would have difficulty in orally explaining why.

Mechanical/Functional: a mental orientation which is conscious of ‘what makes things tick’. This consciousness, from that point, may take a number of different functional directions according to the type and number of other traits involved: visual, auditory, natural, computational, routine, social, managerial. In itself, it is subconscious ‘savvy’ relative to the function and utilization of mechanics or mechanical things.

Pragmatic/Factual (Dogmatic): strong opinions and positions which are self-made and only self-changed; consciousness which sees things polarized in ‘black or white, but no shades of gray’. This may or may not be accompanied by aggression and persuasion to pressure such opinions or positions on others. It can also be exclusively internal and be the source of stress, frustration and learning blockage when confronted with contrary opinions or positions, change, novelty or new ideas.

Clerical/Logical (Detail): a non-intuitive, non-impulsive consciousness which is oriented toward fact, detail and methodical procedure: “a place for everything and everything in its place”. The primary trait is one which is conscious of detail and order. It may be accompanied (and compounded) by managerial, mechanical, routine, analytical and/or computational traits. And it may exist by itself.

Computational: consciousness which is oriented toward tangible problem solving. This trait also gets into different orientations according to the traits with which it is tied and is interactive: managerial, analytical, mechanical, visual, routine, social, interpersonal, dogmatic. It in itself, is not theoretical. It deals in factual problems.

Scientific: a problem solving consciousness, but one which is curious and exploratory. In some instances, this leans toward the natural and material rather than the philosophical, psychological or spiritual. It can readily be coupled with managerial, mechanical, functional, visual, or natural basis.

Philosophical: consciousness primarily aware of the existence, meaning, purpose and destiny of mankind, people, persons and self; consciousness of the larger picture and context of circumstances, events and time—and the ability to see everything within that context rather than as isolated happenings restricted to the ‘here and now’. When coupled with social and natural traits, the philosophical consciousness causes the person to have stability, composure, trust and faith throughout life.

Symbolic/Dramatic: a mixture of philosophical, intuitive, cultural *and* sensory traits (visual and auditory in particular) which cause sight, sound, imagination and emotion to be primary in consciousness. This mental orientation rarely includes mechanical, computational, analytical or clerical traits at significant levels. It is strongly subconscious.

Perceptual Orientation

Rote Retention: clerical/logical/factual/dogmatic consciousness which absorbs and retains literal fact ‘as is’ *without* interpretive, theoretical or emotional blockage, interception or alteration—a filing case mind which can ‘print out’ verbatim at signal.

General Concept Retention: philosophical, analytical and/or literary consciousness which records the essential nature of things—that sees the ‘wheat’ without recording the ‘chaff’. Unless this ‘essence’ is, in the mind of the person, truly ‘wheat’ worth storing, it is rejected or forgotten on a priority basis.

Triggered Logic: philosophical/scientific/analytical consciousness which is strategically perceptive, one which immediately and concurrently analyzes and utilizes perceptual fact and data. The recording in consciousness (memory) may be considerably altered from either rote retention or general concepts because it is already ‘being put to use’.

Triggered Computation: perception here concentrated on the data and mechanics of the problem in a specialized, even limited way. It can concentrate so much on the ‘trees’ that it fails to see ‘the forest’. It deals in the immediate, factual and tangible. It is not a theoretical perception, and analytical only in a limited sense.

Triggered Imagination: an innovative, exploratory, creative consciousness which is triggered into imaginative and speculative consideration of that which perceptually entered consciousness. There is no rote retention. A general concept retention is there, but it becomes altered by the imaginative and speculative activity.

Triggered Fantasy: consciousness which is *immediately and continuously* triggered into imaginative wanders upon the perception (reception) of ideas or even facts. Fact and/or data are not retained; neither is the imaginative wandering limited to the immediate nature or region of that which triggered the mental activity. Rather than being like dominoes tripping dominoes in a related and sequential order, it is more like Ping-Pong balls tripping mousetraps on which other Ping-Pong balls are sitting. Things will happen; thoughts will occur; but the direction and duration are hard to trace, even harder to predict.

Blockage of Data: A data oriented mind is receptive to , and perceptive of, rote data. Other minds are not. Most are not. In that event, blockage will occur to a greater or lesser degree. Dogmatism, social orientation, other motivational priorities, stress, imagination, sensory orientation, etc. are factors causing data blockage.

Dogmatic Blockage: there are two areas of primary dogmatic blockage: (1) a dogmatic consciousness which has its own opinions and positions which only it establishes and only it changes for its own reasons, and (2) a self-consciousness and self-orientation which put self-interest ahead of the acceptance (*or* perception) of anything which may affect, threaten or challenge that priority and sensitivity of self. If both of these strong traits are present, perception and learning are limited.

Resistance to Change: attachment to the familiar; resistance to sudden, radical or unexpected change. Perception of change or its possibility for such a person will be turned off by stressful, negative reaction. Only time can change the negative, emotional reaction to neutral or positive logic and choice. A minimum of 3 weeks exposure prior to positive logic and choice or acceptance must be allowed. It can easily require a year.

Blockage under stress: Intimidators know and recognize little about intimidation and its effects. Intimidatees know a great deal about, but, because of the roles involved, they can tell no one about it except those who, through experience, already know. It remains, therefore, a mystery to most people, teachers

and administrators included. A scowl, a frown, folded arms, a timed test, an alarm clock with the pin pulled—these and many, many more factors of criticism, sarcasm, pressure, intimidation and ‘pecking order’ can and will wipe out both input perception and output expression. This is a major factor of major or total blockage in education, training and vocational performance.

Perception Regarding Input “Media”

Written—Essay Form: consciousness which is sensory, intuitive, impulsive, imaginative, creative or inclined toward the symbolic and dramatic will find the essay form much better able to communicate to himself or herself than technical, numerical, data or detail formats.

Written—Technical Format: the strategic, analytical, rational, manipulative and/or managerial mind welcomes data and information in technical form because it can ‘get down to business’ with minimum input and maximum utility. It carries both information and procedure to memory.

Published Written—Data Form: computational and clerical consciousness prefers data rather than problems, puzzles, narratives, theories or allegories. Its world is detail and methodical procedure—“by the numbers” order and environment. Rote retention, detail perception and clerical function are traits typical to this form of perception.

Visual—Pictures, Illustrations: for some, it is true that “a picture is worth a thousand words.” Perceptual input and mental orientation are primarily through the physical eye tied directly to the “the mind’s eye”. Mental processes are heavily toward the subconscious. If there is a mechanical awareness joined to the visual orientation, an even greater part of consciousness will be sensory/subconsciousness which functions ‘on its own’.

Auditory—General Concepts: See “Written—Essay Form” above and “General Concept Retention” on Page 2. This is the ideal input media for those who are philosophical, sensory and *not* inclined toward literary, clerical, methodical or routine activity. It is particularly ideal for those who are so gregarious that they will not schedule or accept the isolation from others for reading.

Auditory—Facts & Data: the ability to absorb fact and data from oral communication is unique to a special few. Even note-taking is inadequate compensation for the majority of individuals. For those not oriented toward auditory perception of fact and data, this form of attempted input is not only a waste of time; it leads to confusion, frustration and stress.

Coping With Learning Environments

Social—Large Group: those who are gregarious and/or equipped with social traits of self-sufficiency, aggression, persuasion, managerial capability, etc. are motivated toward the company of, and association with others as the ideal personal and communicative environment. For those who are not so motivated or equipped, involvement in large groups will cause inhibitions, perceptual and communicative blockage.

Social—Small Group: For the non-gregarious, self-oriented who is, nonetheless, equipped for social persuasion or dominance, the small group is preferred over the large group or isolation **if** the group appears to that person to be in his or her interest. For those oriented toward large-group involvement, small group involvement is fully within their coping capability.

Non-Social—Alone, Isolated: some persons seek and need isolation from others if they are to perceive and retain information rather than be distracted. From the foregoing definitions, those who require an isolated learning environment can be readily identified.

Lecture—Group: an ‘impersonal’, non-intimidating, auditory orientation which favors a large number of persons, particularly if the lecture communicates general concepts (and uses visual media to some degree) rather than fact or data presentation. “Lecture” here means one person speaking to a listening group. It does not suggest dialog. It particularly does not suggest public questioning or testing.

Dialog—Group: public dialog favors those equipped with the aggression, persuasion, intimidation, manipulative, managerial or gregarious traits which cause them to cope with, gain from, or control an interpersonal dialog with others. Contrarily, it works against those not equipped for dialog.

Individual Study—Alone: there are individuals who require isolation from others for an environment in which they can perceive, concentrate and absorb. A number of individual or interactive factors can cause this need. Unless they have such an environment, distraction, frustration and/or stress can cause perceptual and input blockage. A careful review of the rating factors of this entire list will give a clear picture of traits helping or hindering this loner orientation.

Formal Structuring: two principal kinds of persons are in need of formal structuring of their learning environment: (1) non-aggressive, non-persuasive, factual and procedural persons who want and need “a place for everything and everything in its place”; and (2) those who need a structured, known, given, accepted, monitored and reinforced learning environment which compensates for their lack of self-discipline and drive.

Loose Structuring: a ‘best of both worlds’ learning environment which appeals to the persons who are equipped with analytical, exploratory, disciplined minds. They gain from the disciplines and procedures of formal structuring and find challenge in non-structured (but disciplined and procedural) exploration in the areas of the non-structured environment.

Non-Structured: the independent individual who is marching to his own drum who, successful or not, must follow that beat which he alone hears and which he cannot avoid hearing. It is this person who poses the greatest challenge for teachers and institutions because a learning environment for that person must be custom tailored. Teaching, for that person, must be the creation of a unique learning environment for that person **not** the ‘breaking’ of the individual to the habits and the convenience of the teacher or institution.

Coping With Classroom Environments

Teacher-Student Relationship

The following teacher/student relationships are rated on the basis of the teacher's primary role in establishing the relationship environment and the student's reaction to that environment. Thus, it is a rating of reactions of a person in a subordinate role to a person in a superior role.

Authoritarian: a superior-subordinate relationship where the teacher is the only and final authority; where the student 'knows his place' and is expected to stay there. This relationship favors the student who is self-sufficient and can cope with it by being either independent of it, or dependent on it.

Critical/Pressured: some, but few, students need a 'task-master' to cause them to do what they would otherwise fail to do because of one or more inherent traits. Strong non-scholastic motivations may be involved. Traits benefiting from imposed discipline and pressure are avoidance of routine, lack of attention to detail and methodical procedure, need of supervision, balance against self-oriented dogmatism.

Distant/Impersonal: such a relationship may be the preference of either the teacher, the student, or both. If so, the validity of such a relationship can be determined only through identification of the real traits involved. Otherwise, it may, instead, be simply the lack of an outgoing personality, gregariousness, aggression, persuasion or other social factors. For some, it is a preferred and satisfactory relationship which they do not want altered.

Friendly/Distant: it is probable that the teacher is gregarious and benevolent, but not equipped with aggression, persuasion, dominance or other traits which would lead to closer involvement with the student. If so, the nature of some students would narrow the gap; the nature of others would widen it. The end result would probably be a relationship mutually agreeable to all concerned.

Harmonious: a relationship of mutual trust and respect where each person is an asset to the other. Certain types of persons need certain other types.

Benevolent: this rating indicates the response of the student to a teacher sacrificially dedicated to his/her good and gain. In most cases, the rating will be high. Nonetheless, there will be those who do not, or cannot, benefit from benevolence; instead, they exploit it to their own detriment.

Tolerant/Permissive: some teachers can maintain institutional standards and reach their objectives through a tolerant/permissive relationship with the students. And there are some students who thrive in such an atmosphere. They are the exception rather than the rule. Exceptional people most often require exceptional conditions if they are to develop exceptional potential.

Skills for Testing Procedures

Oral—Public: few individuals are equipped to truly give evidence of knowledge before a crowd, particularly on a ‘quiz’ basis, even more particularly on an impromptu basis. The rating will more likely indicate the level of intimidator/intimidee, persuasive/non-persuasive, spontaneous/avoiding conflict, stress/non-stress traits in the student.

Oral—Private: every encounter of two or more persons is a ‘pecking order’ encounter in which each person will cause, find or be put into his or her ‘place’. A one-on-one ‘quiz’ of student knowledge is guaranteed to reflect the intimidator/intimidee balance between teacher and student or student and teacher. (Intimidation is a non-verbal, non-functional subconscious presence of interpersonal aggression/dominance trait levels which recognize no age, sex or ‘personal’ qualifications. It can be countered by structured, known, given, accepted, respected accreditation and/or institutional positions, roles and authority.)

Written—Essay: Testing via written essays favor those who are motivated in philosophical, literary, intuitive and expressive ways. General concepts are more natural to them than facts, data, technicalities or rigid form.

Written—Multiple Choice: multiple choice questions favor the ‘filing case mind’ which, through rote memory of fixed input, can differentiate between choices on the basis of second-guessing the author of the questions. In all other cases, from lesser to greater degrees, the multiple choice options create more options, therefore questions, than answers. Only those in the center of the mental orientation types (top of page 1) will find multiple choices advantageous for revealing their knowledge of a particular subject.

Written—Topical:

Tests—Timed: this is very often a gauge of sensitivity to pressure and/or intimidation (impersonal, maybe personal) rather than a test of knowledge. It can often occur that a total expression blockage occurs when time is imposed on test response. Stress is a serious factor in perception and expression. Very few benefit from timed tests; most suffer! Ratings will give evidence to that fact.

Tests—Graded: although the environment of graded tests reduces the intimidation and stress factors, it often increases the involvement of the subjective orientation of the teacher (except in mathematical and factual tests—which then favor the analytical, computational, clerical minds over the perceptual, intuitive, impulsive, philosophical, explorative and creative minds).

Tests—Informal Appraisal: a test of this sort rests on the unavoidable assumption that the teacher knows the subjective uniqueness of the student and ‘scores’ success or failure of the potential (i.e. growth of the potential) of that subjective uniqueness. If so, the rating would always indicate the inherent ‘drive’ of the student toward his or her own destiny. Unfortunately, that includes the impact of social and interpersonal relations and is therefore conditional on a relative basis.

