

The validity of the Values Orientation (VO): A discussion of 20 case studies

The status of scientific disciplines can be speculative, explanatory or descriptive. Philosophy is an example of a speculative science. Hard sciences such as Mathematics and Physics can be regarded as explanatory in nature. Psychology is, however, a descriptive science characterised by a weak rational basis and some degree of empirical evidence.

In order to make Psychology more empirical, psychological measurements thus need to be validated. However, identifying adequate and measureable criteria for the purposes of comparison and validation is complicated by the inherently different theoretical approaches within Psychology, each based on a unique set of assumptions.

There is furthermore no clear meta-model of how psychometric measurements of IQ, personality, values, information processing tendencies, consciousness, and other psychological constructs are supposed to be related. The conclusions based on research of the interrelationships between constructs from various assessment approaches, however, should ideally be guided by theory as opposed to being data driven. Besides the comparison of various test results, the validation of each of these measurement techniques thus requires a variety of research approaches.

Various techniques can be used to determine the validity of a particular assessment, including:

- concurrent validity - by comparing it to other similar tests;
- predictive or criterion validity - through comparison to real life behaviour;
- content validity - on how well the test samples the behavioural domain in question;
- face validity - whether the look and feel of the assessment seems relevant to the purposes of the assessment, and
- construct validity of an assessment - whether the performance on the test reflects the theoretical model involved.

Of these approaches, construct validity research seems the most valuable and appropriate.

In trying to establish the metric qualities of the Values Orientation (VO), its concurrent validity can be studied by comparing VO results to that of Personality, Team Role, Emotional Intelligence, IQ and cognitive tests amongst others. Some of the methodologies used in measuring these different constructs, however, seem intrinsically ill-suited to integration given their emphases on structural versus dynamic qualities of behaviour and the nature of the theoretical models involved.

IQ tests and Personality profiles largely represent the **Differential paradigm** in psychology, which is aimed at investigating ways in which individuals systematically differ. The constructs measured include “abilities”, “traits” and “typologies”. It is often referred to as a “top down” approach given its reliance on statistical procedures to identify observed structural trends. Typical constructs such as “g” and the Five Factor Model are thus largely rooted in covariance. The assumption in using such super-ordinate traits which are derived at statistically is that the constructs seem to indicate laws of behaviour. Nevertheless, Psychological phenomena are not always clear, independent and structured. The constructs also reflect interpersonal differences as opposed to intrapersonal factors and fail to explain behavioural tendencies.

The theoretical model(s) on which the VO is based, are of a holonic nature and represent a “soft” or dynamic hierarchy where each “level of awareness” includes and transcends its predecessors. The VO thus does not measure discreet and independent constructs such as those proposed by the differential paradigm. Awareness is seen to slowly and repeatedly emerge as an individual or group become more conscious.

The quantitative descriptive statistics associated with “top-down” traditional Psychometrics thus specify useful categories of behaviour that have little theoretical and explanatory power. To use the results of the differential measurement approach to validate an inherently different, process oriented approach, often referred to as “bottom-up”, is far from ideal. Concurrent validity evaluations across theoretical paradigms may therefore simply be interesting at most.

Research has nevertheless been done on the interrelationships between the VO and other psychometric assessments representing the Differential Paradigm, namely the MBTI personality inventory, the Belbin Team Roles and the EQi assessment of Emotional Intelligence. VO results have also been compared to Cognitive Process Profile (CPP) results on cognitive preferences and capabilities.

The interrelationships between VO and other psychometric constructs have been explored through Correspondence and Bivariate Analyses to generate a wealth of useful research questions and hypotheses. As expected, relatively low correlations were, however, found. Given the underlying theoretical model of the VO, it can be hypothesised that the organising frameworks, memes or worldviews as measured by the VO, may determine the manner in which a person is likely to respond to personality and EQ tests.

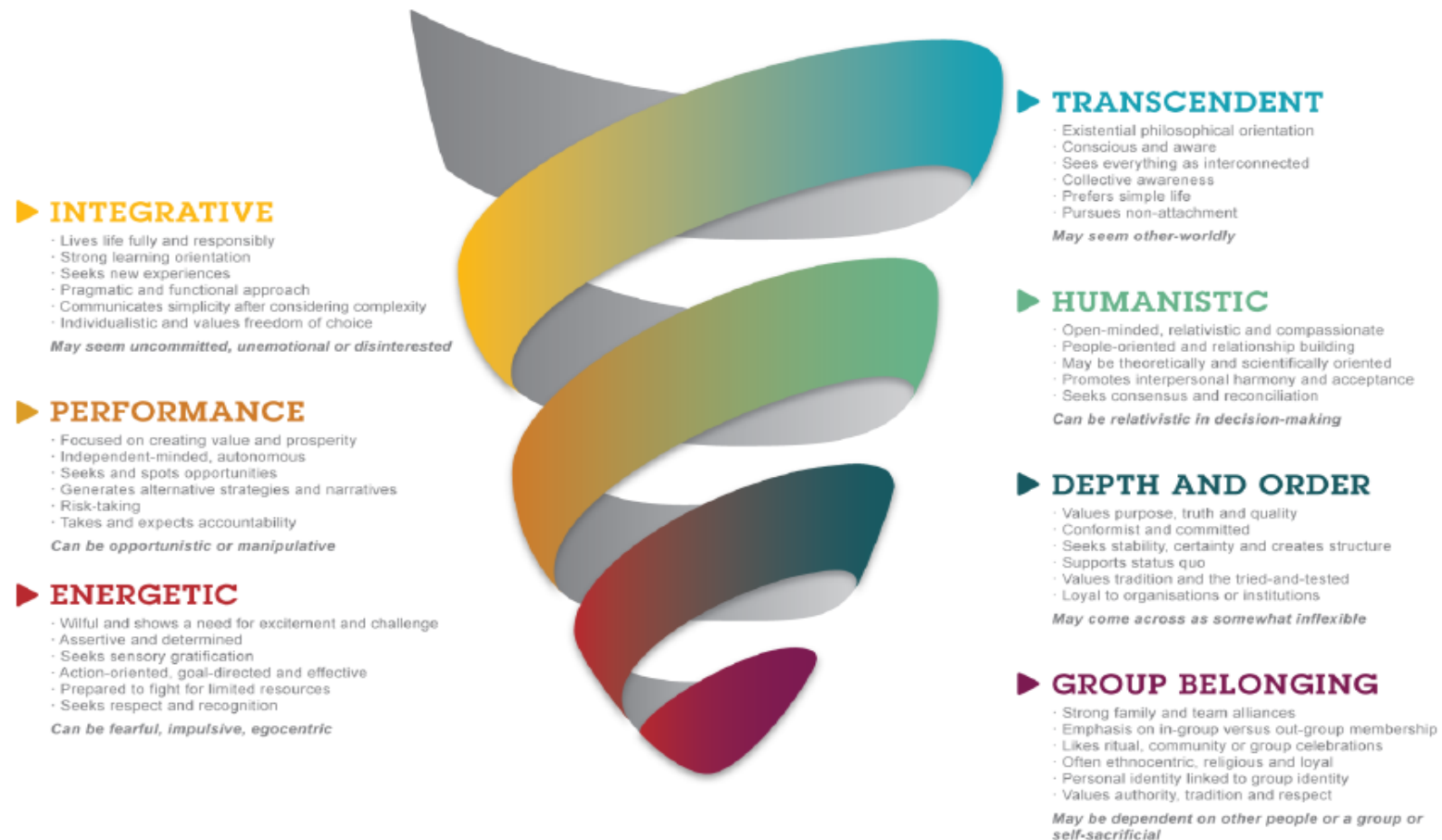
The VO measures consciousness while the CPP measures cognition. Both of these assessments are based on holonic theoretical models. However, cognition represents only a small subcomponent of consciousness and awareness. In other words, a person’s worldview is likely to determine how they are expected to apply their intellectual capabilities – for what purpose and to achieve which goals. When comparing the VO to the CPP, low or non-existent correlations are thus expected between the two tools as intelligence and consciousness are not expected to be linearly linked.

A more useful approach by which to validate the VO assessment is to explore its **construct validity**. This would entail testing the principles of the Spiral Dynamics (SD) model, including:

- the predictable emergence of ever inclusive worldviews;

- ever decreasing levels of egocentricity and ethnocentricity at higher levels of awareness;
- the proposed interrelationships between the “warm” and “cool” colours of the spiral dynamics model, which refer to the fluctuation between individualistic versus group awareness;
- the progression from an external to an internal locus of control and the associated emotional states of these levels; and
- the theoretically specified relationship between contextual requirements and the emergence of suitable worldviews – in other words, whether the values of people meet their contextual requirements or not. Specific cultural tendencies that characterise types of work, industries, organisations, group membership and context, are thus expected to impact on the worldviews and values of the people involved. This can best be observed by measuring the value orientations of those who feel comfortable and best progress in specific contexts.

The Values Orientation tool is based on, amongst others, the Spiral Dynamics (SD) model of Graves. It can be represented in the following manner:



Besides the quantitative studies that are discussed in the VO Technical Manual, the many observations of the value orientations associated with career groups, career levels, organisations, industries and socio-geographical regions, have emerged. In validating the results of the VO, both qualitative and quantitative research methods have therefore been used.

The goals of this approach were not as much statistical or scientific in nature as it is to tell a story of some of the VO findings thus far. These studies are meant to reflect repeated and interesting observations of an almost anecdotal nature which is perhaps well suited to the scientific status of Psychology.

The following case studies have investigated a number of VO-related research questions including the impact of socio-geographic and regional influences, organisational cultures, career-related preferences, levels of work and educational qualifications.

The y-axes indicate the proportion of the sample group which accepted or rejected the particular value orientations.

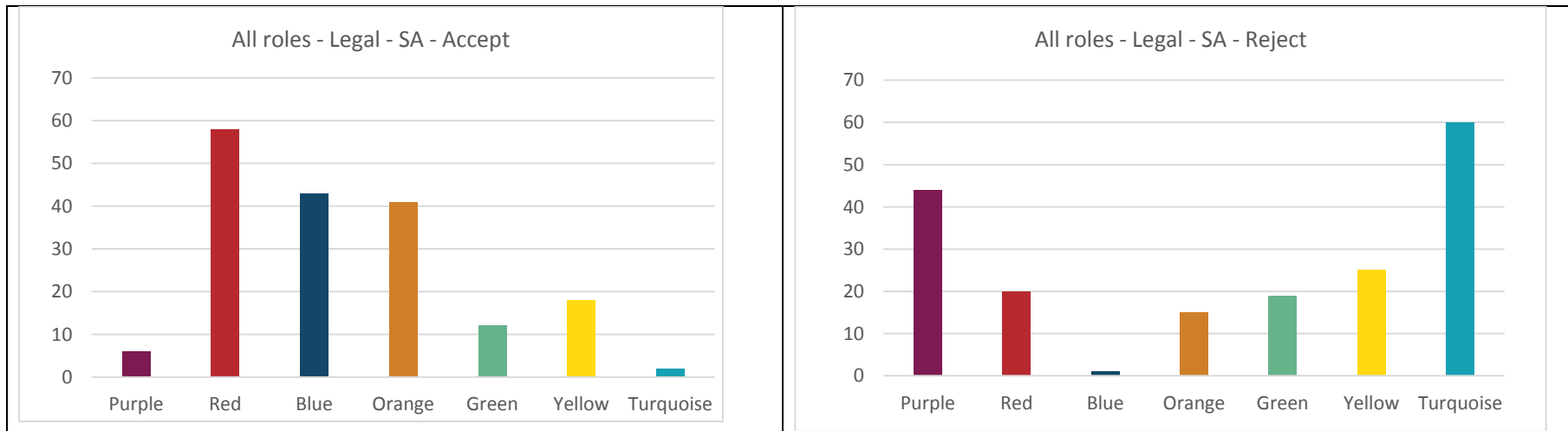
Study 1: Various career groups within the Legal industry in South Africa (n = 400)

Senior employees from a South African legal firm with several offices nationally (across nine provinces) were assessed using the VO. The positions involved were those of Executives, Managers, Attorneys/Litigators and SPAs. The value orientations of the subgroups were compared across region and across career group.

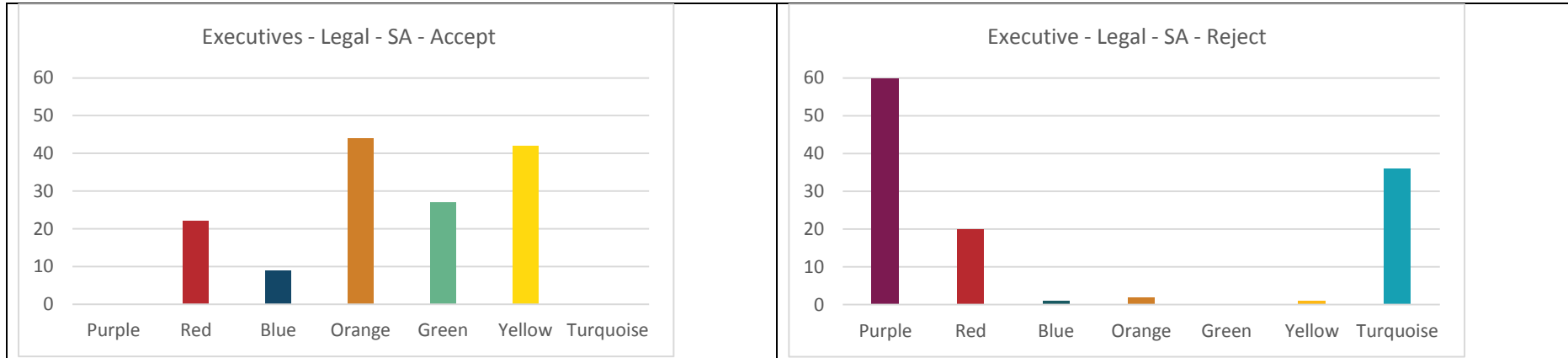
Questions:

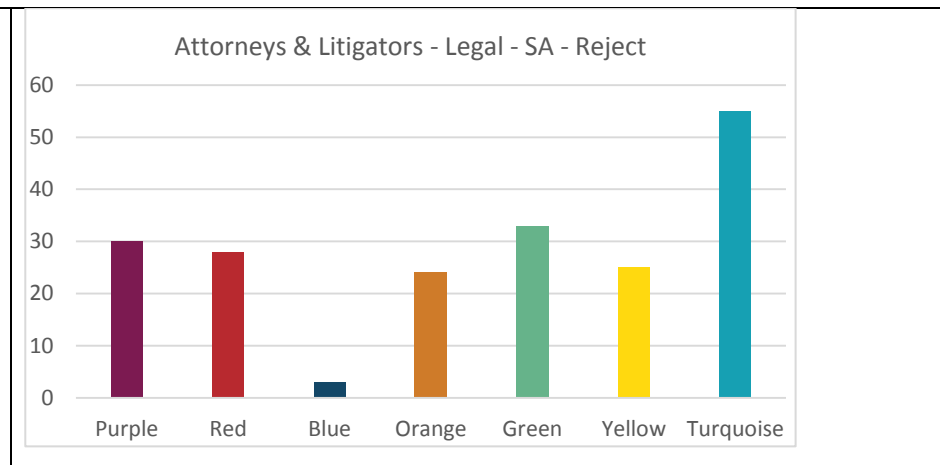
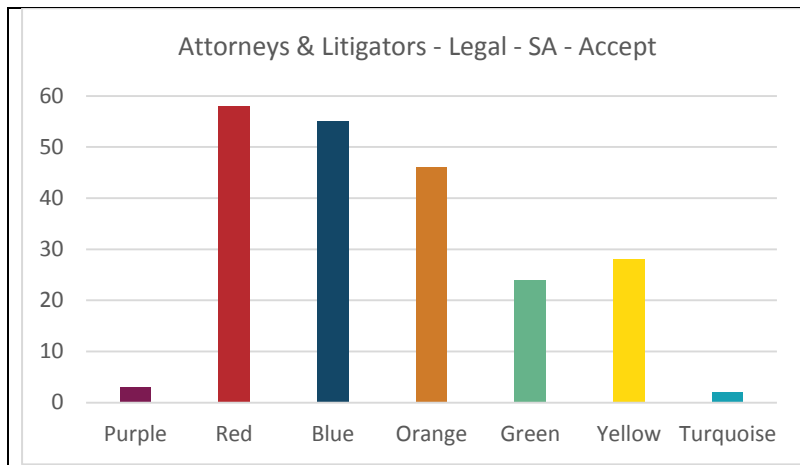
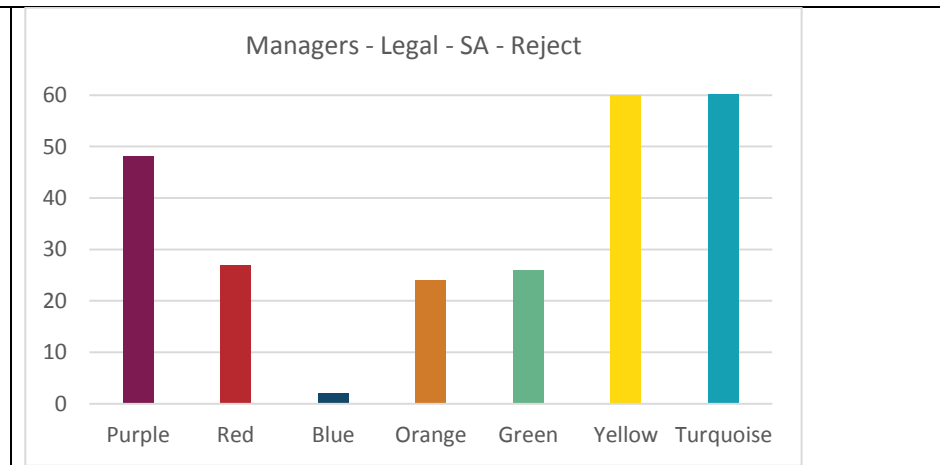
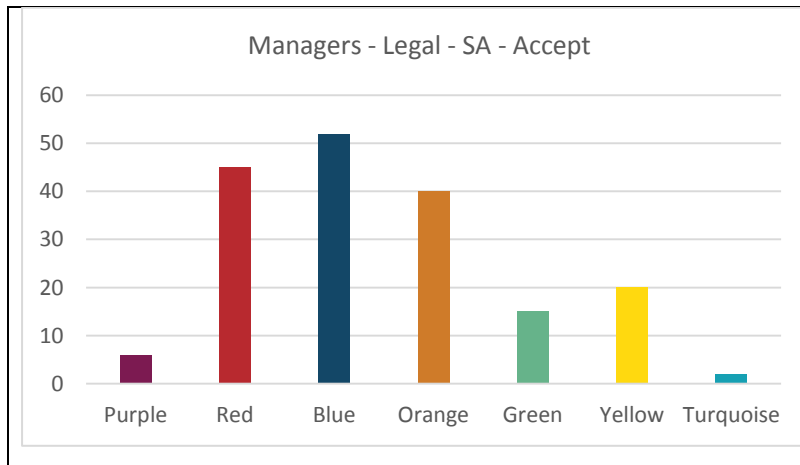
- Organisational culture within the Legal industry
- Value differences between career groups in the Legal field

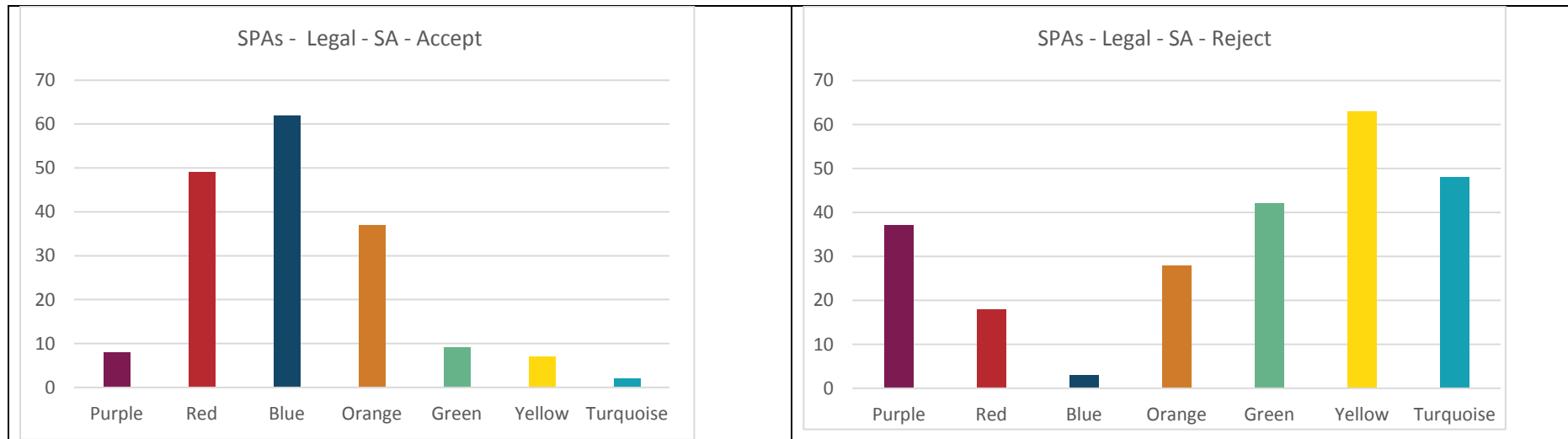
The following value orientations emerged across region and career group:



The results per job level and role category differed to some extent:







Even though only slight differences were found between regions, differences between career groups were clear.

The legal firm in question primarily functions according to the Red and Blue value system. This is, however, combined with other orientations for the various geographical regions (provinces). In Kwazulu-Natal, there seems to be a somewhat spiritual slant to the Red orientation whereas in the Eastern Cape the Red is often combined with a Blue and Purple collective approach.

The employees seem a fairly homogeneous group in terms of their **Accepted** worldview:

- Executives showed a somewhat Yellow and Orange orientation
- The executives were also the only group showing some degree of Green values
- For the majority of the remaining roles, a distinct Red and Blue orientation emerged
- A fair degree of participants also showed an Orange preference
- It was interesting to note that relatively few individuals indicated Turquoise, Green and Purple value orientations.

In terms of their **Rejected** worldview the group again appears to be relatively homogeneous:

- Many seem to reject the Purple, Yellow and Turquoise value orientation;
- It is interesting to note that the group does not reject the Blue, rule based worldview – as could be expected from the culture of the legal industry in general.

It seems that while Red and Blue values and worldviews normally drive decision making in this legal firm, the executives showed more inclusive and sophisticated values than the specialists/professionals and managers.

Findings:

- This Legal firm is characterised by a realistic Blue-Red-Orange culture which is well suited to the nature of work which is to some extent rule-based and adversarial.
- A strong organisational culture emerged in this Legal firm across national regions and career groups.
- There are, however, differences in value orientation between Executives, Managers and Specialists.

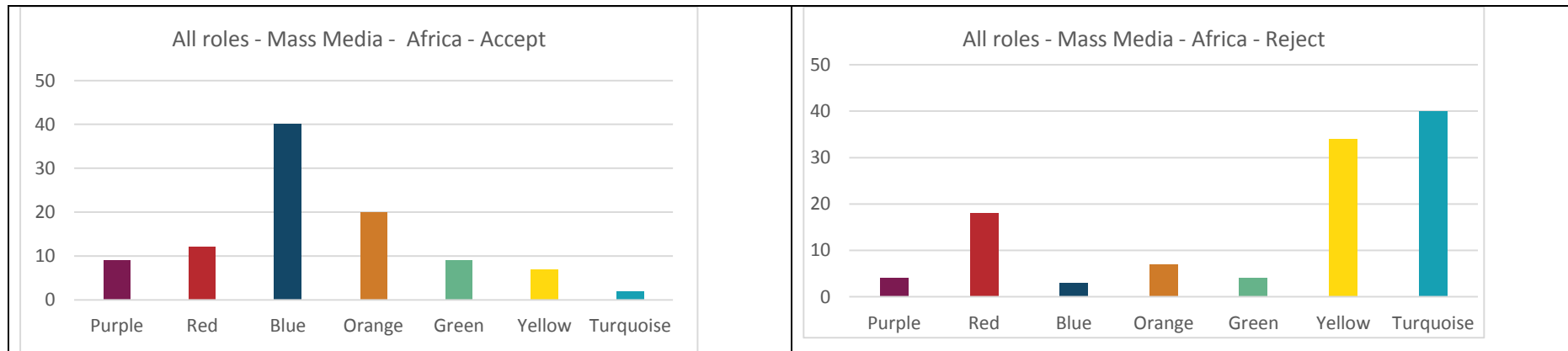
Study 2: All roles within a Mass Media company with offices across Africa (n = 195)

The following sample of 195 employees was assessed for purposes of personal development using the VO, CPP and EQi tools. The sample consisted of people across African countries, career categories and job levels.

Questions:

- Organisational culture of a Mass Media company across Africa
- The impact of organisational and regional culture across career groups

The following results were obtained:



Here the organisational culture seems to reflect its hierarchical structure, administrative accuracy, technological expansion, popular culture and materialistic motives. The predominant Blue value orientation of the employees seems common in traditional contexts characterised by positional power, authority, rules and a family orientation. The Orange values tend to support technological progress and a commercial orientation. The worldviews and values of this group of employees thus seem well-suited to their broader cultural context as well as their organisational competency requirements.

Findings:

- A clear organisational culture has emerged in this Mass Media company.
- A Blue (a traditional orientation) and somewhat Orange (entrepreneurial) orientation have been found across regions and careers.
- The values of this company are well-suited to the business model and nature of the work involved.
- Social-geographical factors in Africa seem to play a key role in determining the organisational culture of this company across countries.

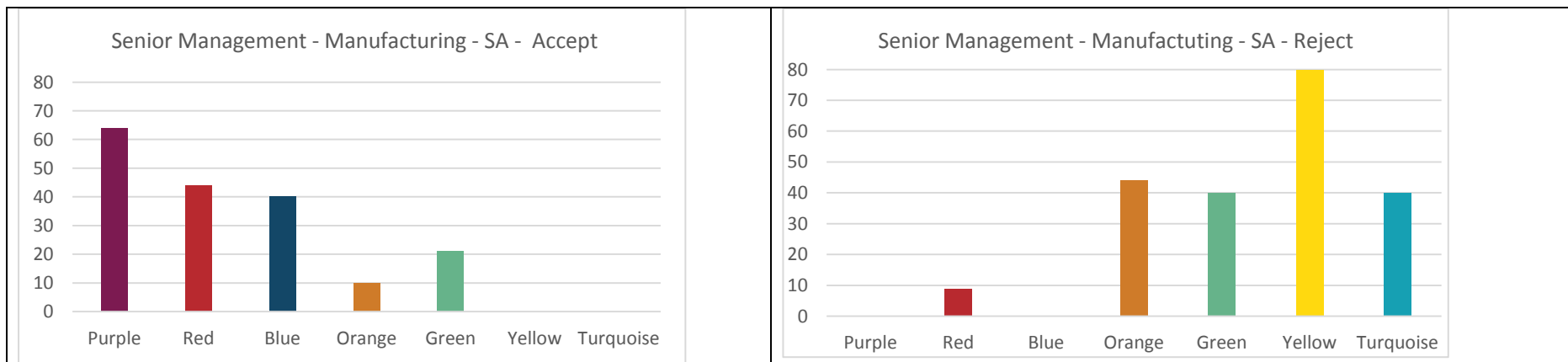
Study 3: Values across career groups in the Manufacturing industry in South Africa (n = 78)

This descriptive study was conducted in a Manufacturing firm in South Africa. Various career categories were evaluated in terms of their value orientations. Included were: Senior Management, HR, Design, Engineering, Finance, Manufacturing, Planning, Procurement, Projects and Quality.

Questions:

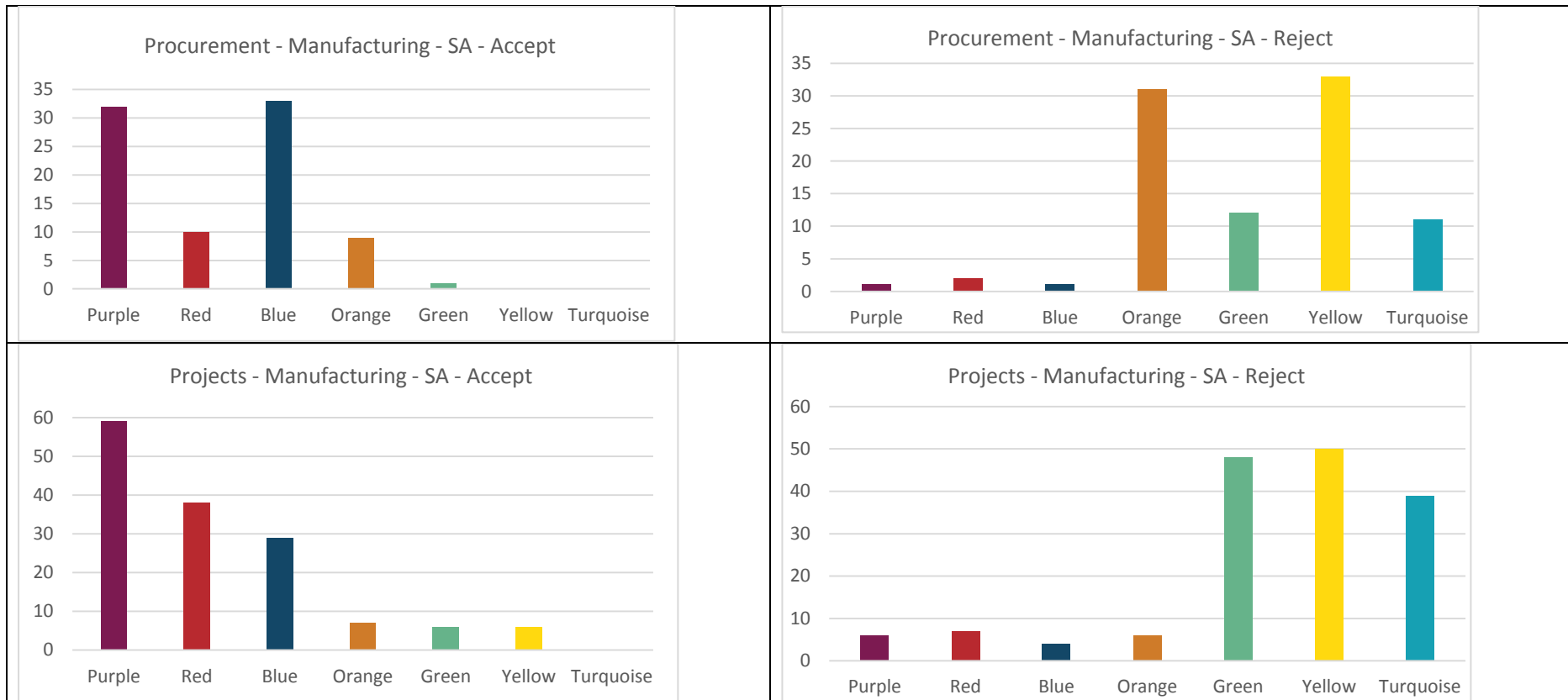
- Organisational culture of a Manufacturing firm in South Africa
- Differences in values across career groups within a Manufacturing firm

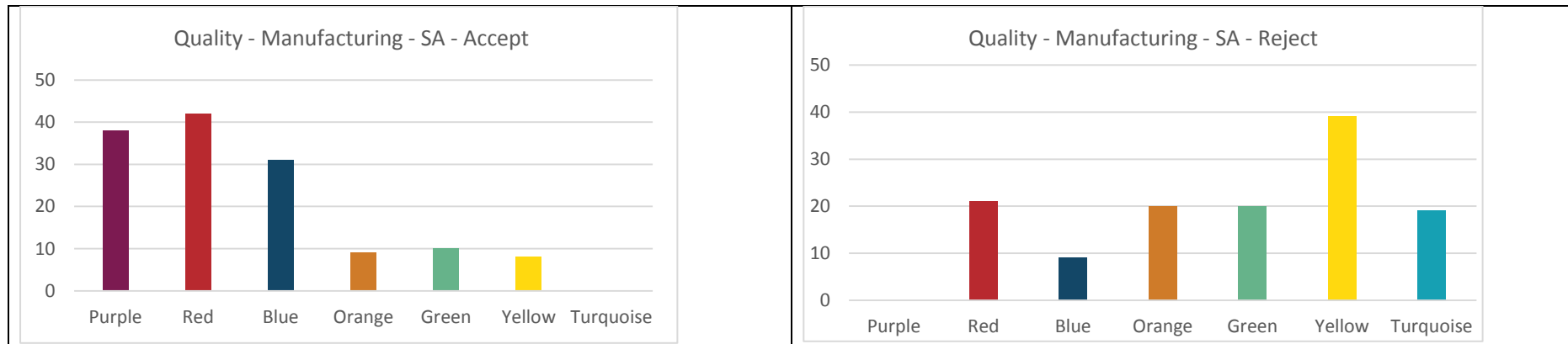
The results are represented below:











This manufacturing firm shows a strong Purple, Red and Blue value orientation combined with a rejection of primarily the higher level Green, Yellow and Turquoise orientations. This pattern emerged across almost all the various career categories.

The various career groups showed some degree of difference, though. Few in the Procurement, Production and Design teams, for example, showed any higher level awareness, whereas a small degree of this was present in most of the other teams. The Engineering team showed relatively balanced value orientations. The Planning, Design, Engineering and HR teams largely seemed to reject the commercially oriented Orange values. The Production and the Design teams also showed a low acceptance of the Red valuing system.

Findings:

- A strong organisational culture emerged within this Manufacturing firm characterised by traditional Purple, Red and Blue value orientations which indicate a hierarchically structure, tangible work focus and results orientation.
- The organisational values reflect that of the wider socio-geographical region.
- Subtle differences emerged across career group, but organisational and regional cultural influences seemed to prevail.

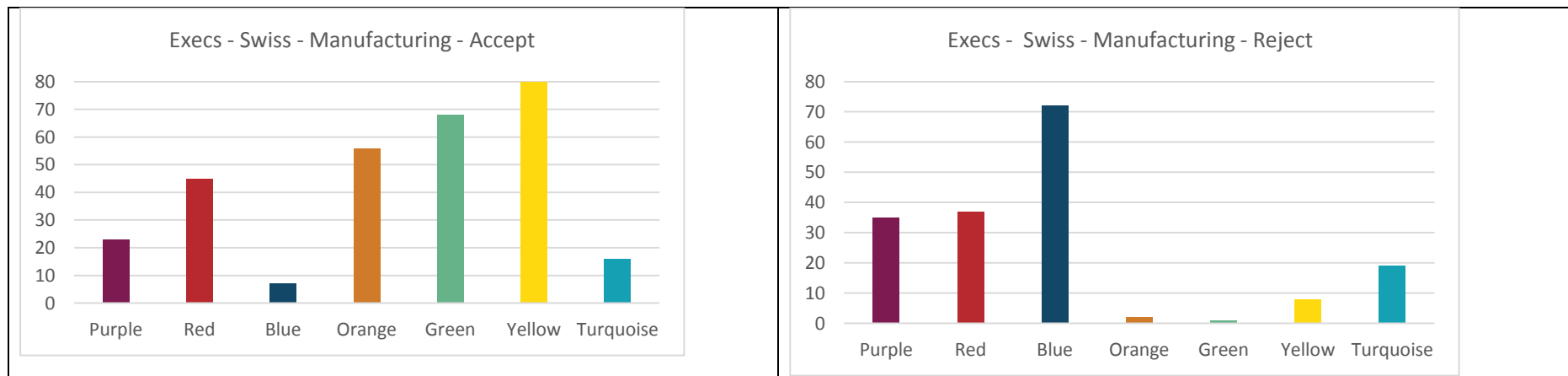
Study 4: Executives in Manufacturing across international regions in a Manufacturing firm (n = 200)

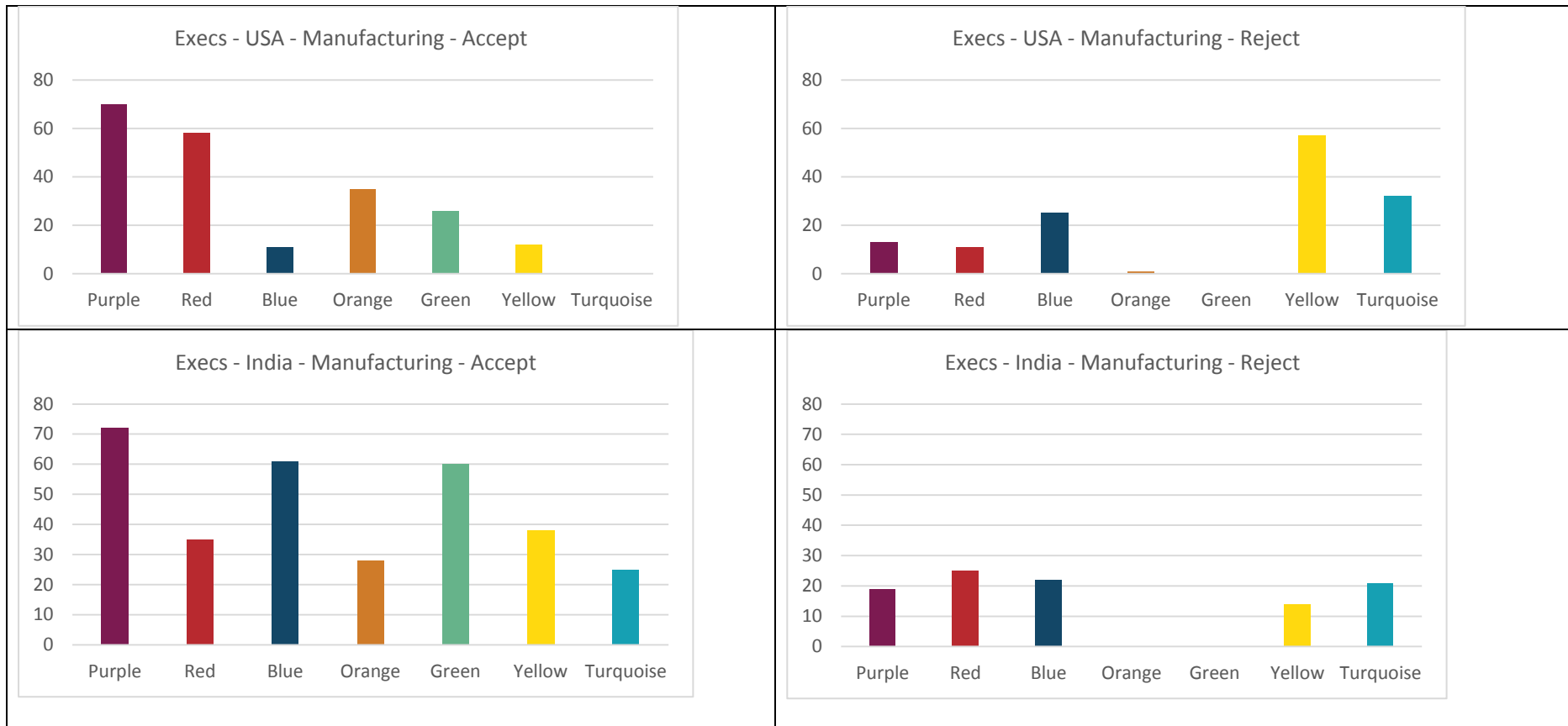
In this study a sample of approximately 200 top executives across four regions were assessed including: Switzerland, India, North America and South America. Tools measuring cognition (CPP), values (VO) and motivation (MP) were used.

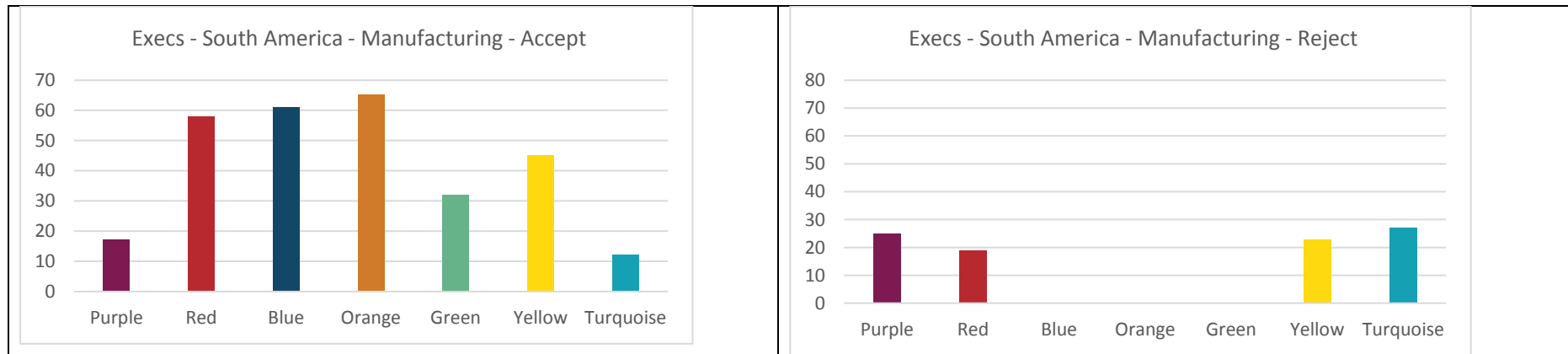
Questions:

- Organisational culture within the Manufacturing Industry
- Regional differences in organisational culture
- Regional impacts on executive values

The findings on value orientations and worldviews are represented below:







No clear organisational culture emerged in this Manufacturing firm. The executives from different international regions showed vastly different value orientations:

- The executives from Switzerland, where the head office is situated, showed highly inclusive and open-minded Yellow and Green value orientations with a degree of Orange and Red, indicating a possible commercial orientation
- Executives from the USA primarily showed Purple-Red worldviews indicating a hard-driving and in-group orientation
- Those in India showed collectivistic tendencies by primarily embracing Purple, Blue and Green values.
- Executives from South America primarily showed Red-Blue-Orange worldviews normally associated with a realistic, results oriented and commercial orientation

In terms of the rejection of values, the following picture emerged:

- None of the regional groups rejected the Orange and Green values
- A relatively strong rejection of Blue emerged amongst the Swiss Executives and a rejection of Yellow was shown by the Executives from the USA

These differences in value orientation of the executives from different regions can potentially complicate communication and derail strategic initiatives.

An interesting finding (not graphically shown here) is the significant overrepresentation of the rare transcendent Turquoise value system, which seldom occurs amongst corporate executives that were all rated as excellent performers.

Findings:

- In this global Manufacturing firm no single organisational culture emerged.
- Executives from various international regions vastly differed from one another in terms of value orientation.
- The impact of regional and socio-geographical influences thus proved more powerful than that of organisational culture for this group of executives.
- In this organisation, executives from India showed a collectivistic approach; those from North America a hard driving, in-group approach; those from Switzerland an integrated, learning approach and those from South America a practical, realistic, and commercial approach.

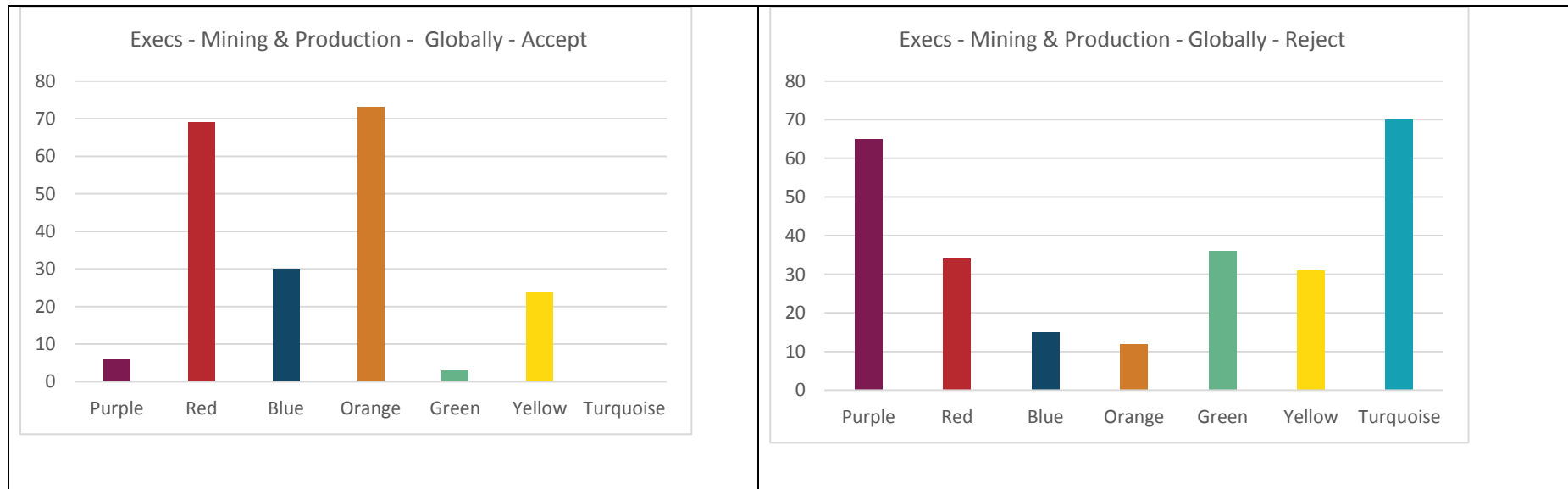
Study 5: Executives from a Global Production and Mining company (n = 400)

The value orientations of top level executives in a global firm with businesses across five continents were assessed across regions and career orientations. Although most positions primarily involved business activities, people from engineering, science, financial and administrative backgrounds were involved. At the time of this study, the organisation was characterised by a strong culture given its origins as a family business. Although the emergence of the firm was characterised by several mergers and acquisitions, its original culture was maintained throughout.

Questions:

- The organisational culture of a global Production and Mining firm
- The impact of regional culture on executive values
- Industry-related versus organisational cultural impacts

Those that were promoted to executive levels, showed the following valuing systems:



The predominant Red-Orange orientation of executives across North America and Canada, South America (including Brazil and Chile), Europe and UK as well as Asia (including India and Russia), indicates the powerful impact of the organisational culture. This value orientation characterises commercially driven and results oriented organisations. Risks that were involved include safety and security, environmental and social impacts. A strong Red-Orange orientation in the absence of alternative values is typically also associated with ethical dilemmas.

Findings:

- In this originally family owned business, which expanded globally, a strong organisational culture was maintained and enforced by like-minded executives.
- Here the organisational culture overruled regional and socio-geographical cultural impacts.
- The Red-Orange values orientation of this organisation is well-suited to the business models involved.
- The organisational culture also overruled career-related cultural tendencies – as executives from diverse academic backgrounds all showed Red-Orange value orientations.

- An interesting observation was that in two global production firms (Studies 4 and 5), executives from the same region, namely India, showed almost opposite value orientations (Red-Orange versus Purple-Blue-Green) given the impact of, or lack of impact of, organisational culture.

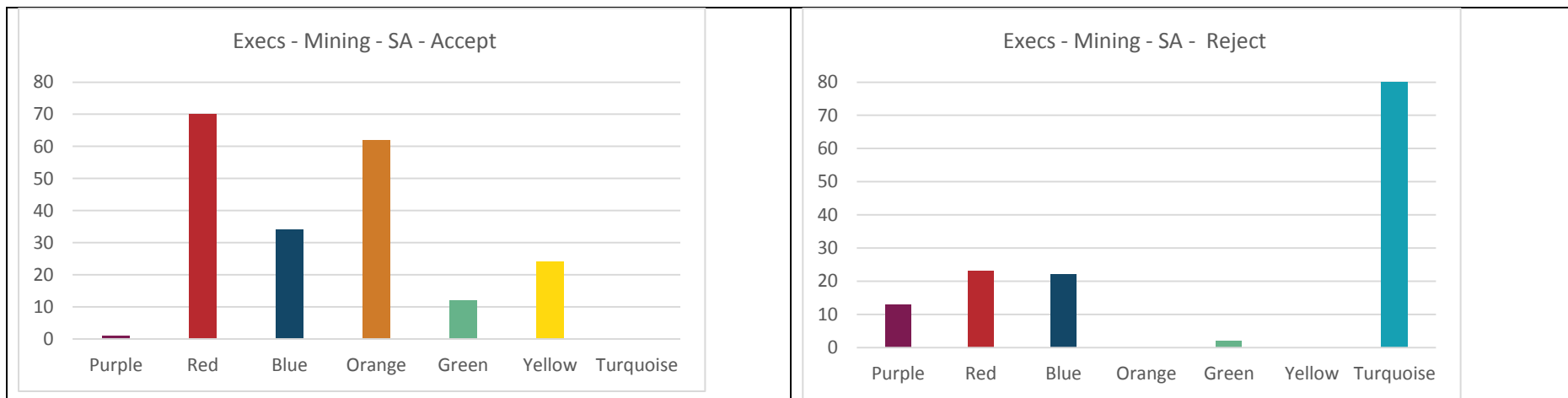
Study 6: An Executive team from a Mining company in South Africa (n = 10)

In this study the value orientations of a small group of executives in a South African mining company were assessed.

Questions:

- Organisational culture within the Mining industry
- Regional differences in the values of executives in Mining

The following values were accepted and rejected:



Overall, this team showed a strong acceptance of the Red and Orange value orientations. They came across as strong leaders, presenting themselves as energetic and goal orientated. At times a somewhat forceful approach emerged which could potentially impact relationships within the team as well as with subordinates. Few showed an ideas oriented, humanistic (Green) orientation.

Findings:

- The organisational culture of this firm seems to reflect that of the Mining industry, globally.
- Mining companies are typically characterised by Red-Blue-Orange values which are well suited to their business models and objectives.
- The Red-Blue-Orange cultural orientation also seems typical for production and mining career groups within the broader South African region.
- This executive team showed a tendency to focus on tangible issues rooted in reality. An acceptance of the Orange values indicates a commercial orientation and openness to business opportunities.

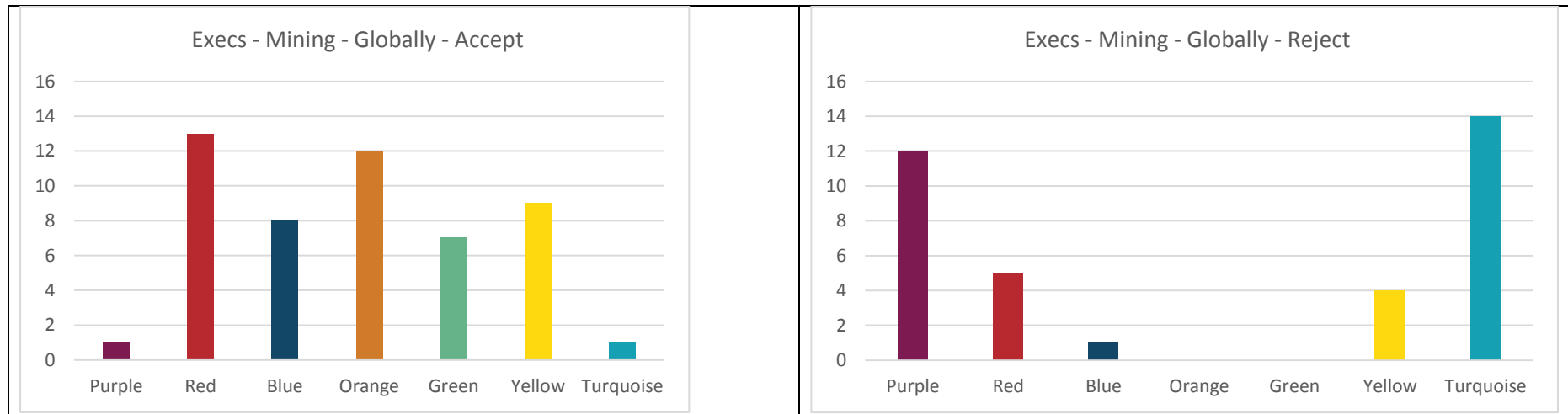
Study 7: Executives from a global Mining company (n = 30)

Executives from various subsidiaries in this global mining company, with its head office in Switzerland, were assessed in terms of their value orientations.

Questions:

- Organisational culture within the Mining industry
- Value orientations of executives from different regions in a global company

The following values were accepted and rejected:



In this sample of executives from the Mining industry, Red and Orange values dominated with Blue a close follower. These values underlie an achievement orientation, energy and drive, competitiveness, a need for control, as well as a need to succeed and earn material rewards, which are well-suited to the demands of the industry. The unusually high proportion of executives (nine individuals) who show Yellow values, may add a higher level, integrative awareness to the team's functioning which is required to deal with the downstream societal and environmental impacts of Mining in general.

Findings:

- A typical Industry-related Red-Orange value orientation emerged for executives within Mining across international regions.
- Subtle differences in the value orientations of executives from different regions emerged.
- The value profiles of this executive team seem diverse which may contribute to their adaptability.
- The high proportion of executives also show a Yellow awareness, which is rare within the Mining industry, but of critical importance given the social and environmental impacts of Mining.
- This Yellow value orientation tends to emerge within certain regions, in this case, Switzerland.

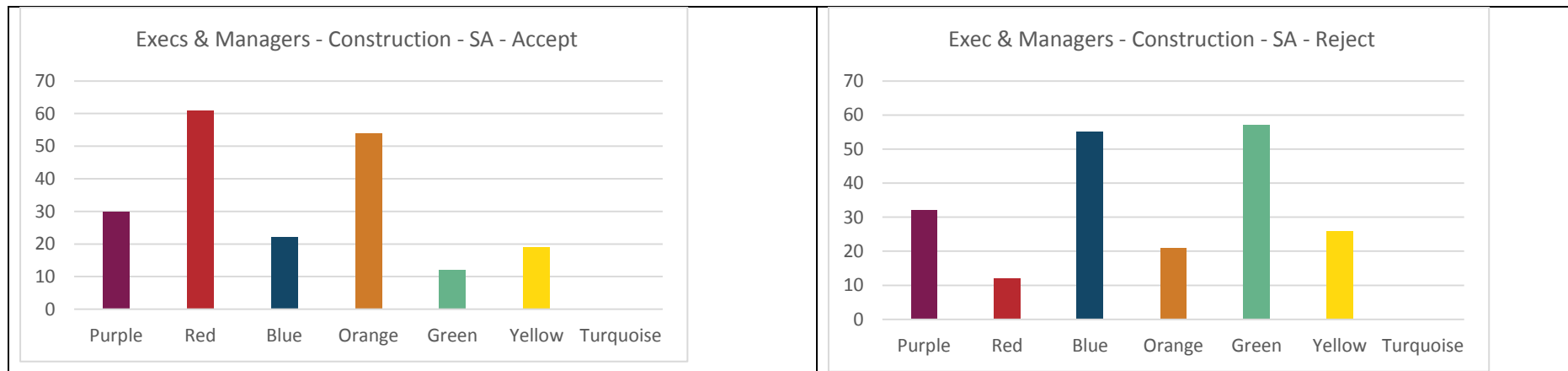
Study 8: Managers from various business units in a Construction Company in South Africa and Africa (n = 150)

A sample of 150 managers from 9 different subsidiaries in a South African and African Construction company were assessed in terms of value orientation.

Questions:

- Organisational culture within the Construction industry
- Career-related value orientations of executive management in technical and business roles

The following results were obtained:



This managerial group from a Construction firm in South Africa primarily adopted a Red-Orange value orientation.

Subtle differences in worldview emerged between the various divisions, though. The Building Managers primarily showed Red values whereas the Civils displayed the strongest acceptance of Blue values. The Housing and Projects managers showed a Red-Orange orientation. Only 12% of these managers showed an awareness of the Green value Orientation, whereas a fair number showed acceptance and rejection of the traditional and group oriented Purple value orientation. 20% showed a Yellow worldview. The majority of managers rejected a Blue and Green orientation.

Findings:

- Management in this Construction firm primarily showed a Red-Orange value orientation which is well suited to the technical and commercial focus of the firm.
- Red-Blue-Orange values also typically emerge within production and mining companies in SA and technical and business roles are often characterised by Red-Blue-Orange values.
- Subtle differences were found between the predominant values in the various divisions in the company, but it seems that the organisational culture dictated the focus and strategies of the entire management team.

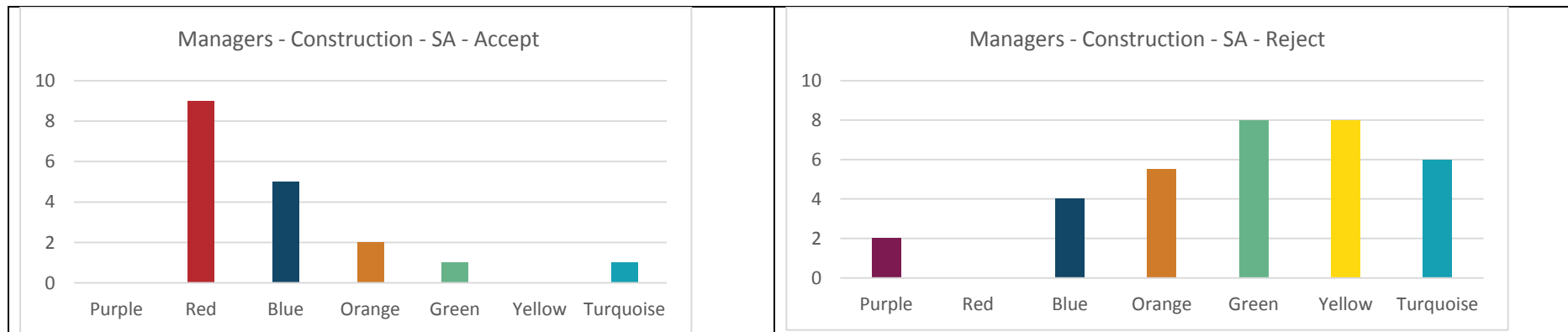
Study 9: Managers from a Construction firm in South Africa (n = 9)

The Construction Industry is characterized by an emphasis on delivery of tangibles, project management and risk.

Questions:

- Organisational culture of a Construction firm
- The value orientations of managers in Construction in South Africa

The managers of a construction firm showed the following value orientations:



For this group of managers, most of whom have an engineering background, a clear Red-Blue preference emerged. It may underlie a practical, structured, hard driving and traditional approach to work, which is suited to the world of construction. The group largely rejected the higher levels values of Green, Yellow and Turquoise, which are related to social and environmental issues.

Findings:

- A Red-Blue value orientation emerged from this small team of managers in the Construction industry.
- This practical, hard driving culture seem typical for Construction firms as well as for the region of South Africa

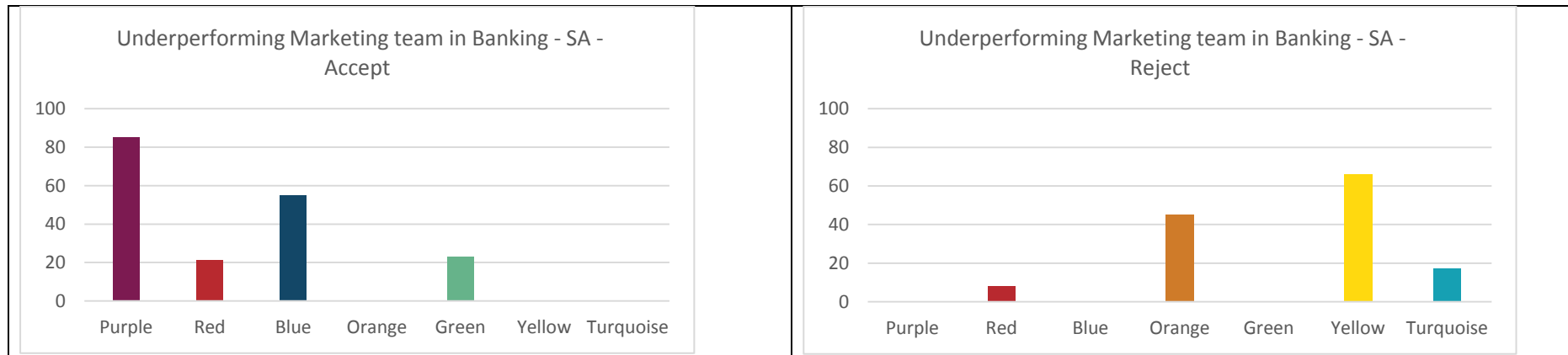
Study 10: An underperforming Marketing team in Banking in South Africa (n = 9)

This study was conducted within the marketing division of a bank. The purpose of the assessment was to better understand the lacklustre performance of the team who has consistently failed to meet targets.

Questions:

- Cultural orientation of the Banking industry in South Africa
- Reasons for the ineffective functioning of a Marketing team in Banking
- Ineffective value orientations in Marketing
- Dominance of socio-geographical versus organisational versus career group values

The results appear below:



Marketing work generally requires an energetic, pro-active and independent approach in exploring options and identifying opportunities. It is mostly associated with a Red-Orange value orientation characterised by an internal locus of control, energy and strategic tendencies.

This under-achieving marketing showed the opposite value orientation. A clear Purple-Blue orientation characterised by a traditional, structured, team approach and an external locus of control, which is not well suited for sales and marketing roles, was shown.

Findings:

- The Purple-Blue value orientation of this marketing team reflects that of the broader socio-geographical context of this particular level of employees.
- Blue values also seem typical for Banking in South Africa.
- The underperformance of this team within the context of Marketing and Sales could possibly be understood in terms of their inward team focus as opposed to an outward customer focus; a reluctance to act independently and a need for externally imposed structure – all of which are typically associated with a Purple-Blue orientation.

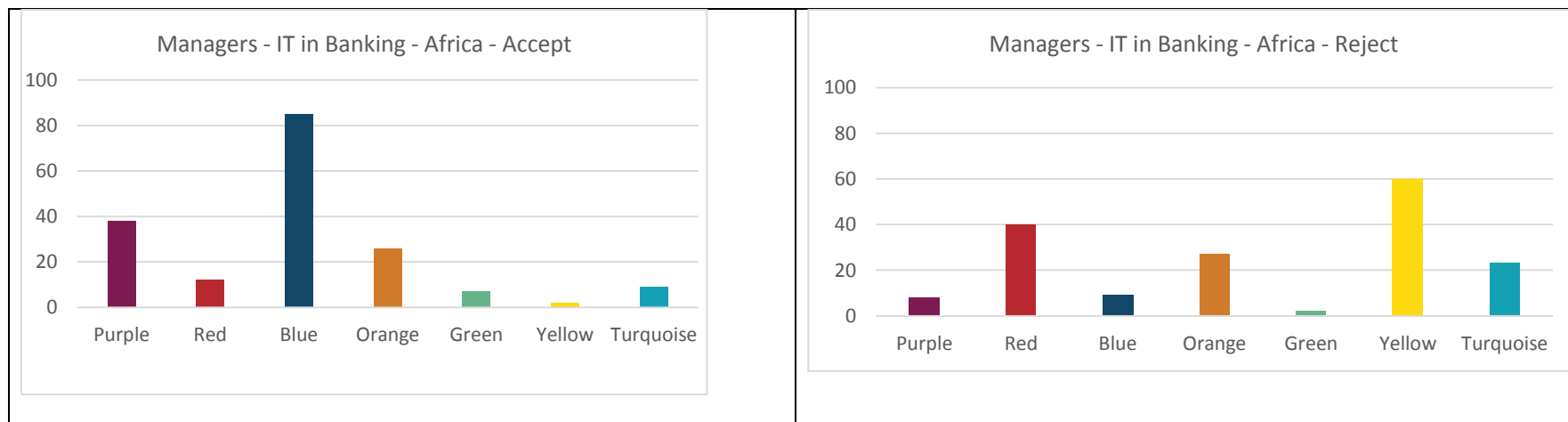
Study 11: IT Managers at central banks throughout Africa (n = 100)

A group of 100 IT managers from central banks in SADC countries underwent a competency assessment on a purely voluntary basis. Countries included were: Tanzania, Kenya, Malawi, Zambia, Zimbabwe, Namibia, Angola, Democratic Republic of the Congo, Mozambique, Seychelles, Mauritius, South Africa, Lesotho, and Swaziland. The purposes of the assessment included personal development and organisational transformation.

Questions:

- Impact of regional culture on organisational culture
- Organisational culture of Banks in Africa
- Regional and organisational culture impacts on career-related (IT) values

The following results were obtained in terms of the value orientations of the participants.



With the exemption of a few countries, most of the respondents showed cognitive, leadership and value profiles characterised by highly structured, rule-bound, traditional, people-oriented and status conscious approaches. 85% of the group showed a Blue value orientation. Some degree of Purple and Orange values also emerged.

Findings:

- In this study of IT managers in Central Banks across Africa, it was found that socio-geographical and industry influences probably took precedence over typical career-related value orientations. The traditional and collectivistic tendencies that emerged amongst IT people in Central Banks across African countries reflect the structured nature of the banking environment and the traditional values of the region.
- Employees in IT roles usually tend to show individualistic, learning oriented, open minded and explorative value orientations. In this sample of IT people in central banks across Africa, it was not the case, though.

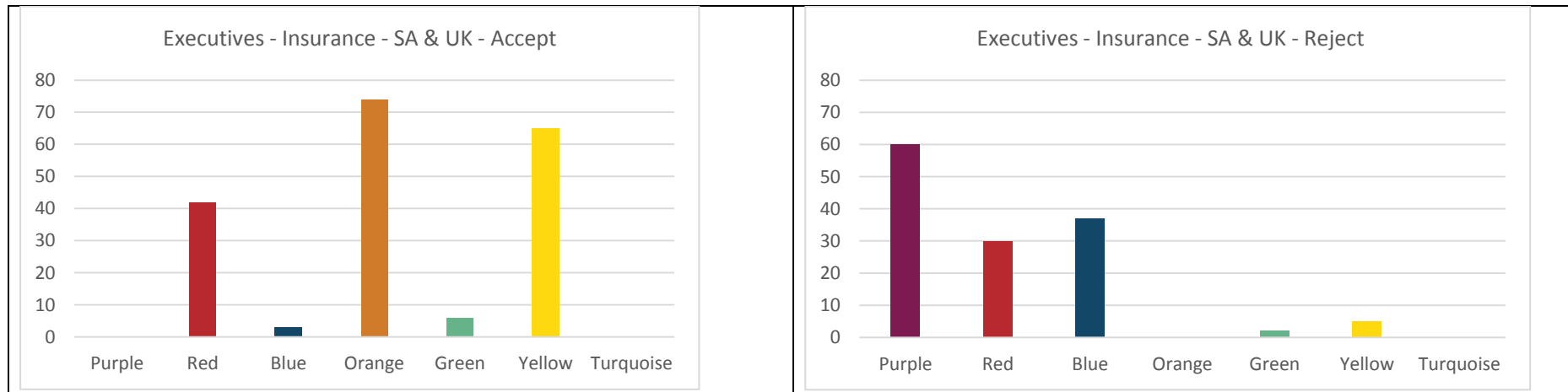
Study 12: Executives from an Insurance company in SA & UK (n = 30)

This study involved the assessment of 30 executives from an Insurance firm in SA and UK. The majority of the participants held multiple degrees in Business, Finance and Actuarial science. The culture of the insurance firm in question can be described as Blue or Purple-Blue in that family values and financial security issues are emphasised.

Questions:

- Organisational culture in the Insurance industry
- Impact of career-related versus organisational culture on executives' world views

The following results were found:



It was found that the executives of this largely traditional insurance firm did not buy into the values associated with their brand. Instead, a strong strategic and independent-minded Orange and Yellow approach emerged. In an additional study which is not reported on here, it was found that Purple and Blue values characterised those at the operational levels in the organisation. Executives therefore seemed to take on a meta-role by positioning the values on the organisation in such a way as to optimise the results of certain divisions and functions.

Findings:

- The culture of the Insurance industry, with its emphasis on family and security and the bulk of its activities aimed at serving those purposes, can be regarded as Blue and Purple.
- However, in this study, other than in Study 11, it was the career orientation and level of work involvement that best predicted the value orientations of executives, which were individualistic and independent minded Orange and Yellow.
- This discrepancy between the organisational culture and the leadership values may, however, create communication challenges and trust issues within the organisation.
- Regional cultural influences seemed to have little impact on the values of the executives.

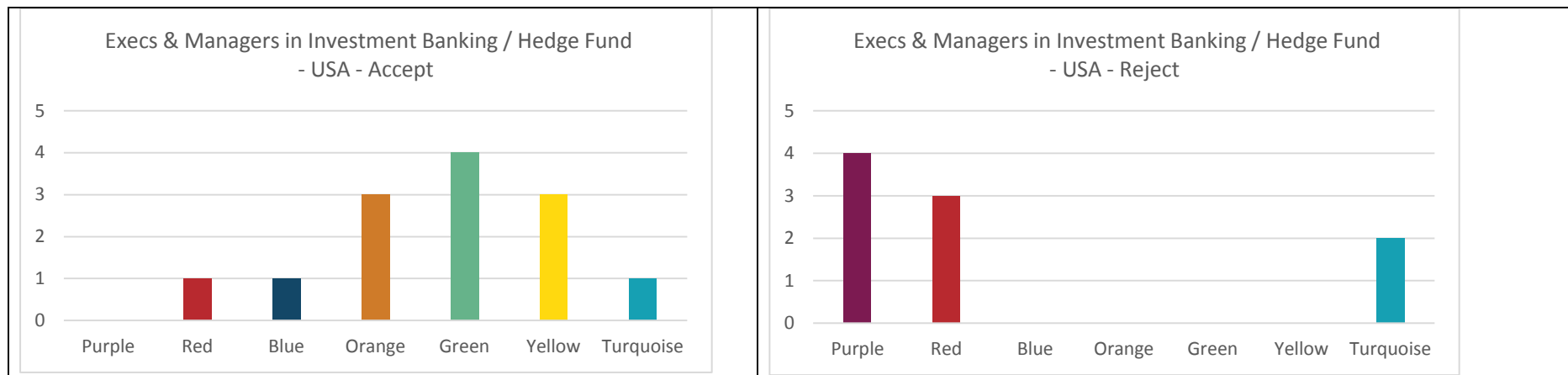
Study 13: Executives and Managers in Investment Banking in the USA (n = 7)

In this study the cognitive and value profiles of executives and managers from a large investment banking organisation / hedge fund were assessed. The majority of the executives had multiple degrees – many of which were in fields other than finance. The organisational culture is carefully maintained and can be described as a close knit community where critical thinking is encouraged.

Questions:

- Organisational culture within Investment banking in the USA.

The following results were obtained in terms of value orientation:



It seems that Green, Orange and Yellow values characterise this small group of consultants / investment bankers. The open-minded and aware characteristic of the Green value orientation as found here, is seldom found amongst executives in Finance. The Yellow and Orange combination is, however, fairly typical of leaders in the financial sector.

Findings:

- In this firm a strong organisational culture is intentionally cultivated through an emphasis on continuous learning, exchange of ideas, a theoretical orientation and a strong sense of community.

- This has resulted in the organisation being characterised by a relatively high turnover of new employees.
- The senior management have diverse academic backgrounds.
- The Green-Yellow-Orange value orientations of the management team in this organisation is characterised by high levels of social and environmental awareness.
- The Green-Yellow values are most unusual within the Investment Banking industry / financial sector.
- Broader regional culture seemed to have little impact on the managerial values in this firm.

Study 14: Systems Engineers versus General and Research staff at a Scientific Research Institute in SA (n = 107)

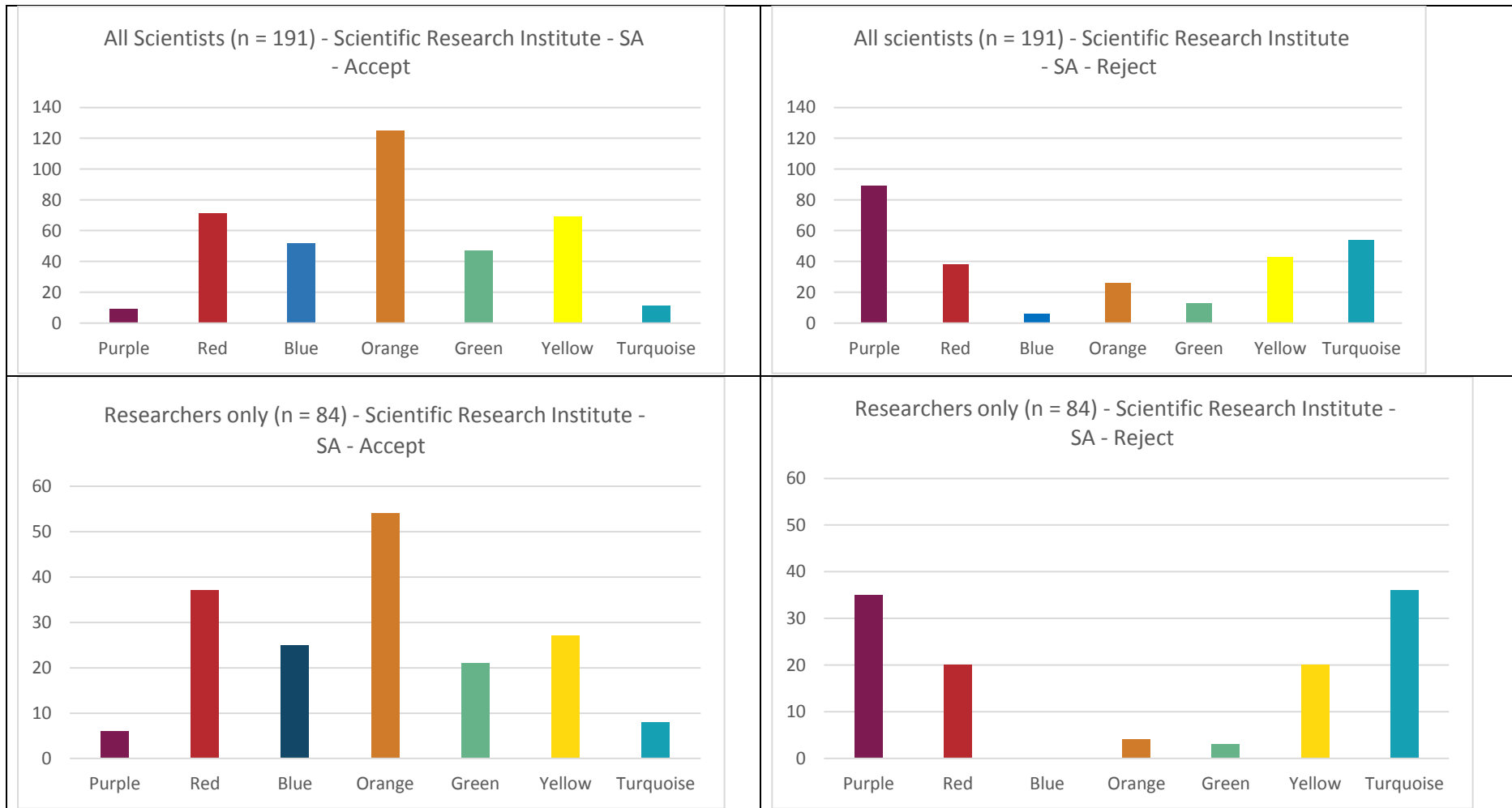
In this 2009 [study](#) conducted by Duarte Goncalves and Janine Britz at a Scientific Research Institute in South Africa, a sample of approximately 107 systems engineers were assessed on four different computerised assessments designed to measure personality, values, cognition and Systems Engineering (SE) competence. The SE competencies included Systems Thinking, Systems Design, Systems Engineering Management and their multiple subcomponents.

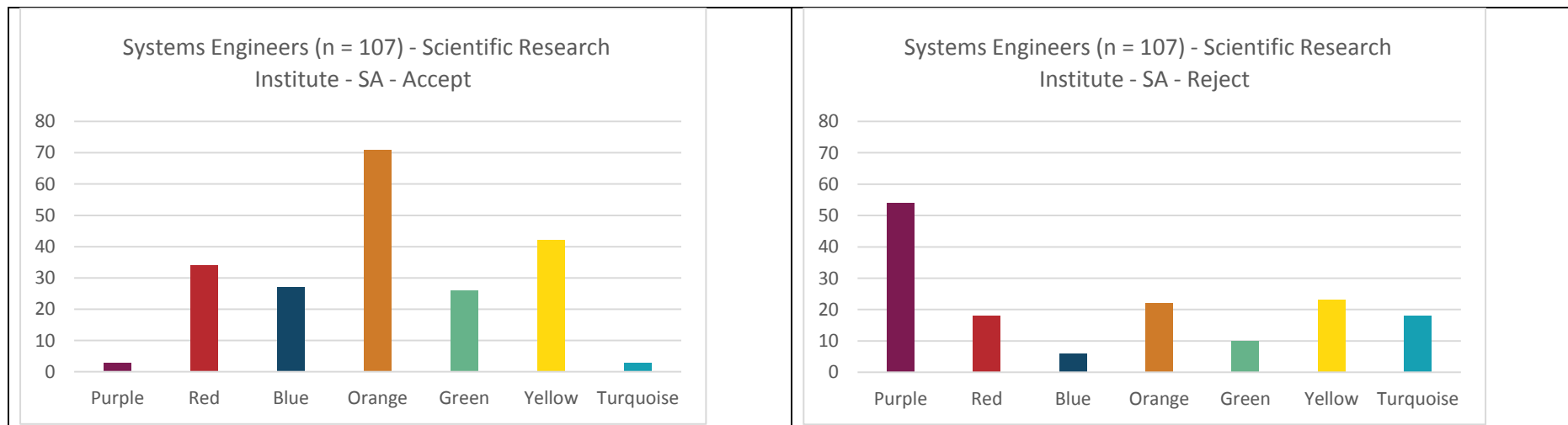
An additional study of the value profiles of general and research staff was also conducted (n = 84) and the results of the two groups were analysed and compared.

Questions:

- The organisational culture within the Research industry
- Career group differences in value orientation amongst employees in scientific fields

Below, the value orientations of these systems engineers are compared to the general research staff, to get an idea of the organisational culture and career group differences:





The findings suggest that the general organisational culture amongst scientists at this partially subsidised Research Institute in SA is Orange, with a significant presence of the Red and Yellow worldviews. There is little acceptance of Purple and Turquoise values – both of which involve a metaphysical / spiritual orientation. Amongst the Researchers (n = 84) there seem to be a rejection of the Purple, Turquoise, Red and Yellow value Orientations. However, as can be expected, the Systems Engineers seem less likely to reject the Turquoise and Yellow value systems – although their decisions and behaviours are unlikely to be determined by Turquoise values.

The research of Goncalves on Systems Engineers (SE) revealed interesting findings. He concludes: “Even though it appears that values have not been considered in the literature for SE screening, it seems useful for predicting high competence on at least 11 SE competencies, Orange significantly correlated with high levels of performance. However, for many of the SE competencies, it was more about what value systems are not rejected rather than what is accepted that predicted performance.”

His paper appeared in: Goncalves, D (2010). The Role of Values in Identifying Systems Engineering Competencies. SyEN #018: News in the Field of Systems Engineering | Project Performance International (Link: <http://www.ppi-int.com/newsletter/SyEN-018.php>)

Findings:

- Although Orange value orientations best represent the organisational culture in this Scientific Research Institute, the behaviour and decisions of scientists seem to include considerations from a number of other valuing systems and perceptual frameworks.

- Purple values are not accepted in this organisation. This finding may be related to the educational level of the participants and their more encompassing approach in general.
- Blue values are not rejected in this organisation which may reflect a sense of responsibility and risk awareness within the scientific research community.
- The Values results of the Researchers and staff in general differ from that of the Systems Engineers in that System Engineers do not seem to reject the higher order Yellow and Turquoise values to the extent that the Researcher do. This may be attributed to the Systems Engineers' strong integrative system thinking approach.

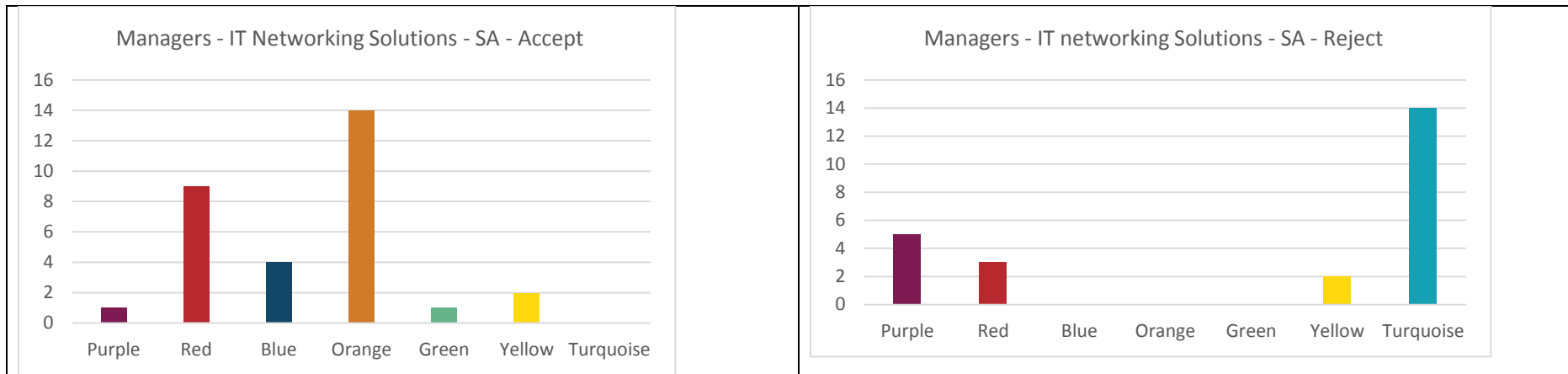
Study 15: Managers at an IT Networking Solutions provider (n = 17)

The following study was conducted in an IT company where 17 Managers were assessed using the VO and CPP. Their positions were also analysed and mainly entailed the conceptualisation and sales of integrated IT solutions for large corporate clients. Most of these managers held business and IT degrees and showed SST level 3 with potential for level 4 functioning on the CPP.

Questions:

- Organisational culture in the IT industry
- Managerial value orientations in IT

The following VO results were obtained:



In this team of managers focusing on the development and installation of IT networking solutions for corporate clients, the majority showed performance driven and competitive Orange and Red value orientation. The Orange worldview is well suited to the fast changing IT environment where an abundance mindset and win-win orientation is required. A smaller percentage showed Blue value orientations characterised by structure, depth, commitment and consistency. The group seem to reject spiritually and metaphysically inclined Turquoise values.

Findings:

- A strong organisational culture characterised by Orange and Red values emerged which is well suited to the requirements of the IT and Sales industries.
- The managers, of whom most have a tertiary qualification in Sales, IT or engineering, show practical and strategic value orientations often associated with those career groups.

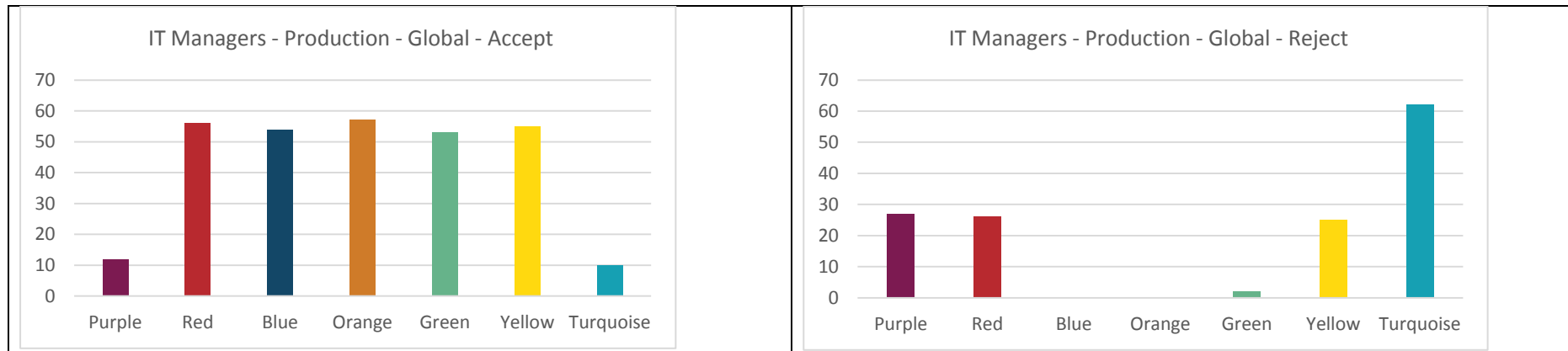
Study 16: IT Managers in a global Manufacturing company (n = 44)

This IT team included people from a number of countries across continents. The purpose of the assessment was of a developmental nature. Several team development workshops followed the initial assessment. The majority of the team members were males below 40 years old.

Questions:

- Organisational culture of global Production firms
- The value orientations of IT managers in Production firms, globally

The following results were obtained:



The global nature of the organisation and the fact that IT managers from different countries and subsidiaries participated, probably contributed to the acceptance of a variety of value orientations. The more “other worldly” and somewhat spiritually oriented Purple and Turquoise values were not accepted.

Findings:

- Frequent mergers and acquisitions globally seem to have resulted in the diverse value orientations characterising the IT managers from this global Production firm.
- Here, it seems that the typical Orange values characterising IT people, as well as the historical hard driving Red organisational culture, have both given way to regional and socio-geographical influences to create a diverse and adaptable team.

Study 17: Managers and Executives at an IT systems solutions organisation in South Africa and Australia (n = 114)

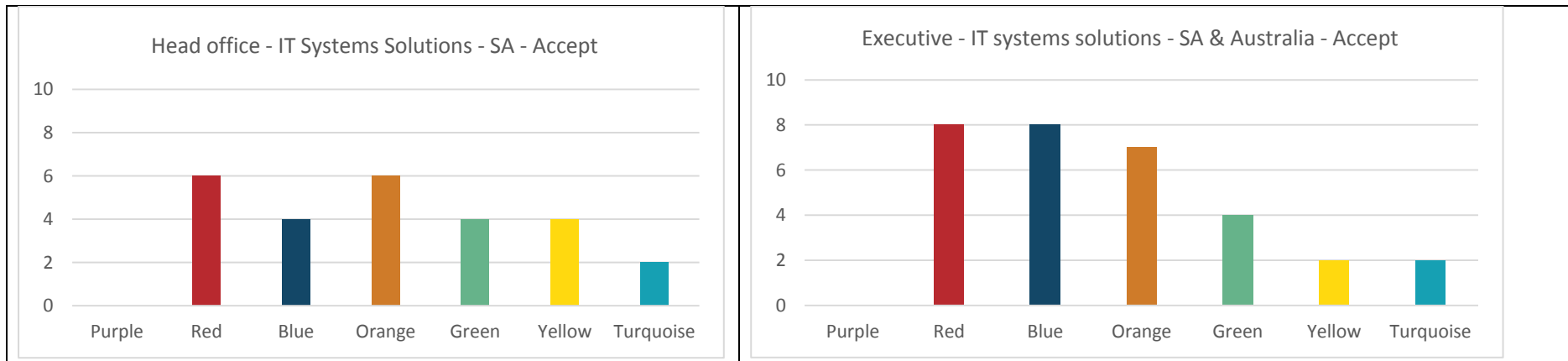
In this study 114 leaders, mostly in Managerial and Executive roles, participated. The organisation focused on the sales and delivery of systems solutions in South Africa and Australia. Participants were assessed in terms of cognition, values, motivation and leadership competence.

Questions:

- Organisational culture in the IT industry
- Impact of organisational culture on the culture of various Business Units

Here the results on the value orientations of six divisions in the organisation are represented:





It was found that this organisation was driven by Red-Blue-Orange value orientation as is typical for the industry. The spiritually and metaphysically inclined Purple and Turquoise values were primarily rejected. The organisation is characterised by a competitive sales culture and the continuous adaptation of new technology to which the predominant value orientation is well suited. It was interesting to note that while the Executive team were Red-Blue-Orange in their orientation, the South African Head office adopted a stronger strategic Red-Orange orientation. The predominantly Red orientation of the Sales team indicates a highly energetic approach which also characterised the Customer support team. The Blue orientation of shared services can be understood in terms of the structured and organised nature of their work. The application solution team showed a surprising Green orientation which may be related to the conceptual nature of their work.

Findings:

- In this study a strong organisational culture emerged that is well-suited to the nature and demands of the competitive and fast changing Information Technology industry.
- To some extent the organisational culture reflects that of the region.
- Differences in value orientations were observed between the various divisions.
- A surprising finding was that the Executive team showed a more traditional and a less strategic approach than the Head office team in South Africa. This may reflect the greater technical involvement in the business of the Head office team as opposed to the Executive team.

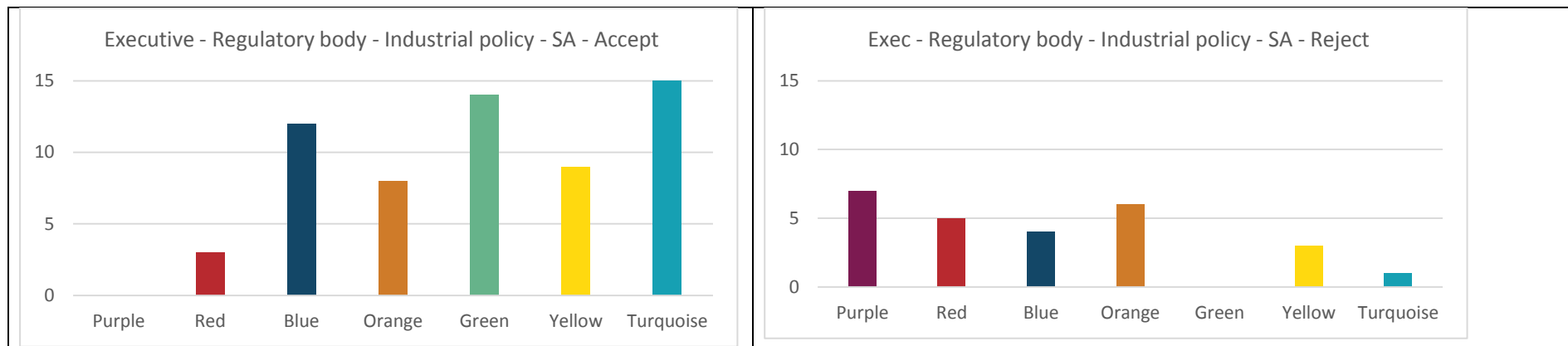
Study 18: Executive managers in Regulatory services in South Africa (n = 27)

This highly qualified management team of a regulatory organisation in South Africa was assessed in terms of cognition, values and motivation. The group in general was characterised by high levels of cognitive capability as well as social and environmental awareness. From interviews with the managers, it seemed that they were driven by inclusive, learning oriented and ethical considerations more so than by achievement, recognition and implementation orientations.

Questions:

- Organisational culture of an industrial Regulatory body
- Value orientations of executives in Regulatory organisations

The following results were obtained regarding their value orientations:



It was found that these managers, most of whom had multiple or post graduate degrees in sciences, overwhelmingly embrace higher-level values such as Green; Yellow and Turquoise, pertaining to humanistic, learning and purpose-driven spiritual orientations. Blue values were also accepted, which, in combination with Turquoise and Green values, suggest ethical awareness and integrity. This is a rare but positive finding given the role of this regulatory organisation.

The typical corporate Red-Orange values pertaining to control, achievement, competition and an opportunistic orientation seem to be less prevalent or rejected by several members in the team. Purple values characterised by a traditional, ethnocentric approach, were also rejected.

Although not represented here, the value orientations of the rest of the organisation were also investigated. It was found that a Red-Blue worldview characterised the majority of the employees at operational levels in the organisation.

Findings:

- The executive team of this Regulatory organisation showed high levels of awareness and integrity (Green-Turquoise) which is well suited to their role as protectors of the environment and consumers of industrial products.
- Although the value orientation of the executive normally permeates the rest of the organisation, it was not the case here.
- In this organisation, the executive leveraged the work ethic of energetic and structured (Red-Blue) researchers and administrators (not shown here).

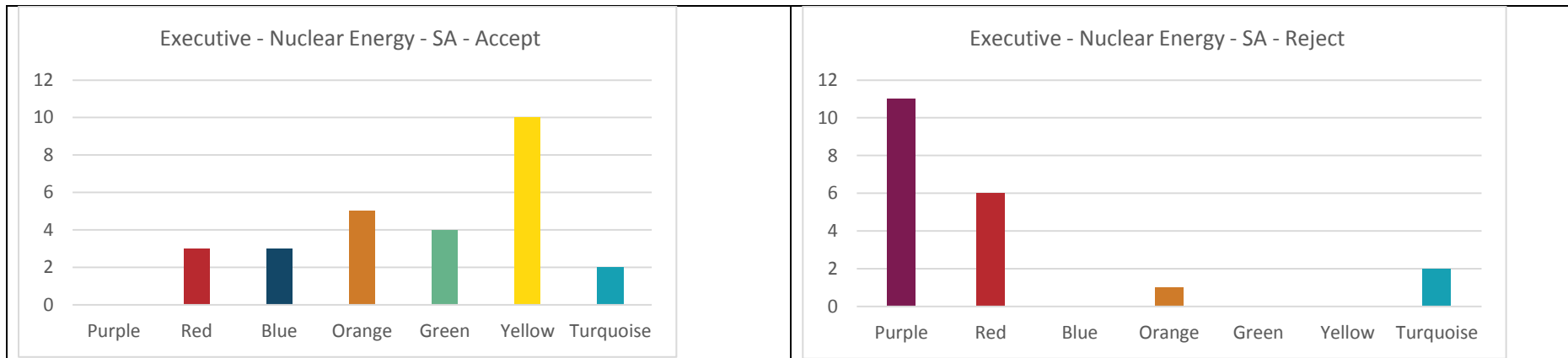
Study 19: The executive management of a Nuclear facility in South Africa (n = 14)

The executive management of a South African nuclear energy plant were assessed. Purposes of the assessment centred around personal and team development.

Questions:

- Organisational culture in Nuclear Energy generation
- The value Orientations of executives in Nuclear Energy

The following results were obtained:



It was found that the majority of this executive management team showed a high level of awareness, a systems thinking approach and learning orientation. Given the risk involved in nuclear energy generation, this value orientation is well suited to the industry. The group also tend not to reject most of the other value systems such as the rule-oriented and committed Blue and the strategically oriented Orange and the people and theoretically inclined Green.

Findings:

- The organisation culture of the holding company (which is not reported on here) of this Nuclear Energy plant, seems Purple-Red-Blue. It seems not have impacted the values of the executive management team of this Nuclear plant.
- The value orientations of the executive team here is predominantly Yellow, which indicates a highly aware, systems thinking approach as well as social and environmental orientation.
- These values are well suited to the technical depth and risk potential of this organisation in the Nuclear energy industry.

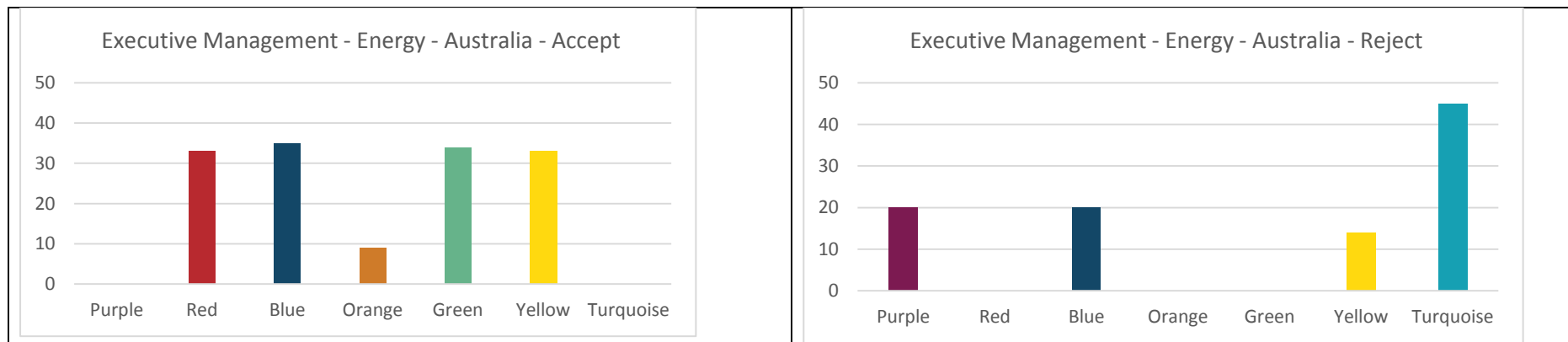
Study 20: Executive management within the Energy Industry in Australia (n = 11)

This organisation focuses on energy provision, gas and electricity in particular, in Australia. Their primary concerns include issues of sustainability as well as social and environmental impacts.

Questions:

- Organisational culture in the Energy sector in Australia

The findings are represented below:



This diverse management team showed a variety of value orientations in that the energetic Red, the risk aware Blue, the socially and theoretically inclined Green and the environmentally Yellow emerged. The team did, however, not focus on Orange which is often associated with a commercial orientation and focus on reputational issues and matters of influence. This diverse approach bodes well for the thorough consideration of issues from a variety of perspectives.

Findings:

- The executive team of this organisation within the Energy industry showed a diverse approach in terms of values and world views. The team can therefore be expected to give adequate consideration to a variety of issues including those of a social and environmental nature.

Conclusion

It therefore seems that broad **regional** impacts on the culture of organisations and career groups are quite powerful, especially where the business focus is of an operational nature for the bulk of the workforce. An organisational culture thus often mirrors the socio-geographical culture in the case of the mining, production and manufacturing industries.

Various **career groups** may show different value orientations where management, specialist or professional work is involved. These differences may, however, be mitigated by regional or organisational culture.

Highly qualified **executives**, often with experience across disciplines, industries and regions tend to show values that are similar to that of the organisational culture. This may be due to natural selection as well as HR practices regarding placement and promotion of those showing certain orientations. These executives may in fact also play a key role in determining organisational culture. At times, executives show meta-level Yellow or Turquoise values by which the culture of the organisation is managed and calibrated to optimise organisational functioning.