

The Extension of Christward Movement

Networks of Redemption

A Preliminary Statistical Analysis of Fruitfulness in Transformational and Attractional Approaches

by Andrea Gray, Leith Gray, Bob Fish, and Michael Baker

Introduction

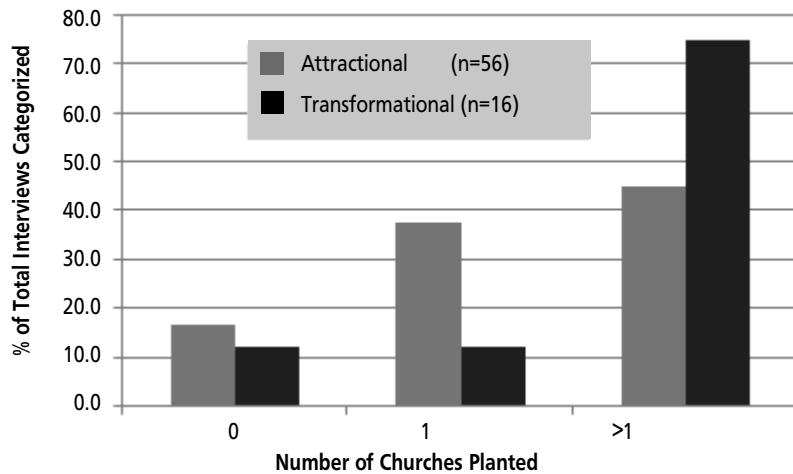
In their article in the Summer 2009 issue of IJFM (Gray and Gray 2009), authors Leith Gray and Andrea Gray showed that a cross-cultural worker's view of what the church is influences how he or she goes about the process of church planting. Two types of church planting models emerged from the data: The first was an *attractional* model, in which unrelated individual believers are gathered together to form a social network (church) that is separate from existing social networks in the community. The second was a *transformational* model, in which the gospel is shared within the context of a natural social network, gradually transforming the network towards Christ, regardless of the stage of faith of individual members of the network.

Following from the qualitative analysis of Gray and Gray, we pose the following question: *What is the relationship between the church planting approach used by the cross-cultural worker, and the number and characteristics of actual churches planted?* In this article, we decided to make a preliminary attempt at answering this question by comparing survey data that had already been collected for the Fruitful Practices project¹ with the qualitative analysis of audio interview data performed by Gray and Gray. The following discussion details the process of analysis, some of the challenges we encountered in the course of the analysis and how we dealt with them, some suggestions for future research, and preliminary conclusions, with implications for field practitioners. (The details of our procedure and analysis are provided in footnotes.²)

Let us return to our research question, "*What is the relationship between the church planting approach used by the cross-cultural worker, and the number and characteristics of actual churches planted?*" We compared two dimensions of churches planted from the interview data for the same respondents: The first dimension was the number of churches (or faith communities) actually planted by each team (as measured by two metrics, in Figures 1 and 3). The second dimension

Leith Gray has worked in Asia and Africa since the 1980s. He and his wife Andrea are involved in research, consulting, and outreach projects in collaboration with local colleagues. The other authors are members of the Fruitful Practices Taskforce, which is a collaborative, multi-agency network of missiologists who are studying effective field practitioners and how God is working through them. Through this they identify and publicize practices that are demonstrably "fruitful" in facilitating faith movements among Muslim peoples.

Figure 1: Churches Planted by Church Model.



was the stage on a church planting continuum of each ministry situation (Figure 2).

Analysis of Churches Planted (CP)

Figure 1 shows how responses were distributed across the three church planting (CP) categories for each faith community model. The church planting (CP) categories were 0 churches planted, 1 church planted, or more than one church planted. The two church models were either attractional or transformational.

Figure 1 suggests that the distribution of church planting results for the transformational sample is more heavily weighted toward the “>1” category than is the church planting distribution for the attractional sample. The transformational sample size is small; further statistical tests indicated a moderate difference between the two types of models for establishing faith communities.³

Therefore, there is some indication in this metric that workers following the transformational model are more likely to have planted more than one church than those following the attractional model. In future research, instruments should be developed to help us understand why this might be the case. It would be useful for such instruments to provide a way of controlling for various environmental variables such as geographical location and length of time the team has been working in an area.

Analysis of Progress in Church Planting (PCP)

Figure 2 shows how interviewees’ responses were distributed across the various categories of church planting (PCP Categories 1 to 6; see Figure 2 for descriptions) for each model (attractional, transformational).

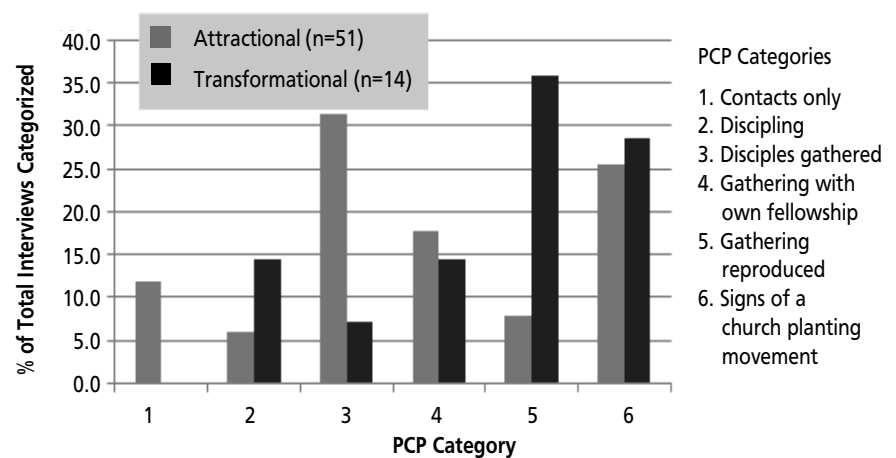
The pattern shown in Figure 2 is similar to Figure 1: the distribution of the transformational sample is weighted more heavily toward the categories on the right-hand side of the chart than the attractional sample.⁴ Follow-up tests for a statistically significant difference between the distributions of attractional and transformational categories showed a stronger significance than seen for the CP metric that was illustrated in Figure 1.⁵ This seems to indicate that workers following a transformational approach were more

likely to be involved in the later categories of church planting. In both types of church planting model, roughly the same proportion of interviewees state that their work is showing “signs of a church planting movement.”

This chart raises several questions. First of all, why is the transformational approach not represented in PCP Category 1 of the church planting continuum? A simple reason might be that workers following a transformational approach tend to jump right into discipleship of an entire social network, rather than evangelizing a number of individual contacts, thus “skipping” Category 1 altogether. Similarly, why are there so many interviews from the attractional model categorized as Category 3? This may be a result of the particulars of the attractional model itself, since the attractional model places an emphasis on gathering the believers together into a fellowship.

More difficult to understand is why there does not seem to be very much difference between the two approaches at Category 6. Perhaps a larger sample size would help us better to understand what is going on at Category 6. Given Rebecca Lewis’s discussion of church planting movements versus insider movements (2009), it is possible that when interviewees reported that their work is showing “signs of a church planting movement,” this subjective statement meant different things to different

Figure 2: Progress in Church Planting (PCP) by Church Model.



people. In the development of future instruments, perhaps the various types and definitions of movements should be allowed for, and steps taken to reduce subjectivity in framing survey questions.

It is also worth noting that in the interviews we listened to, many workers were hesitant to place their work squarely in one of the six categories of church planting. For example, several workers disagreed with what they saw as an artificial boundary between evangelism and discipleship. Other workers rejected a “gathering” category as separate from discipleship on the one hand and church growth on the other.

In a clear example of the confusion over “gathering” terminology, a worker struggles to explain a situation in which members of natural social networks are being impacted by the scriptures and expressing their faith in community. In this case, the interviewer presses the worker to describe her situation in conventional church planting terminology:

Interviewer: ... And then after that, is there a way of bringing them ... to gather them together?

Church planting worker: A gathering?

Interviewer: Has this happened?

CP worker: I ... it ... I guess I'm a little bit ... I understand what you mean because our church-planting thinking is that we have to gather them here for this amount of time or ... but I think our philosophy and the philosophy of our believers is when we gather together in Jesus' name, we're a church ... (GTFP, Interview 53. 2007).

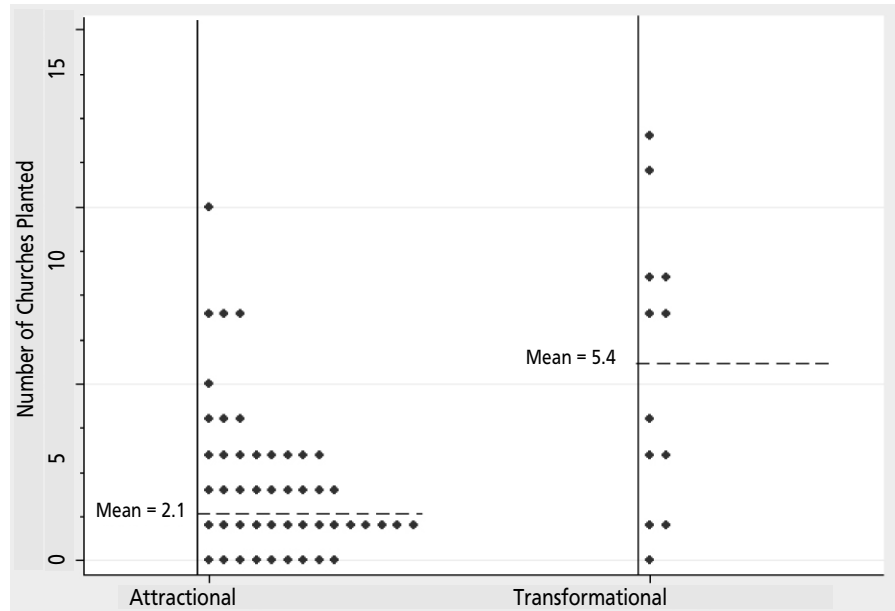
And then later on:

Interviewer: Okay, so from the one-to-one if, once they have said that they'll follow Jesus, are they then integrated into a group so that they can have fellowship? I was thinking more of ...

CP worker: Yes, yes, but it's not what we would think of as a — it doesn't ... I guess I'm not ...

Interviewer: It's not an organized thing ... is that what you mean?

Figure 3: CEBT Data, Outliers Removed.



Each dot in Figure 3 represents a single reported result from an individual interviewee.

CP worker: Yes, it's not an organized thing. They do come together at different points in time, but it's not a, like I said, it's not a certain time, a certain place ... I guess it's a different way of looking at church (GTFP, Interview 53. 2007).

Although the church-planting situation associated with this interview seems to be quite fruitful, it is hard to know how it would be categorized on the continuum of six stages of church planting.

The problem with the terminology related to the gathering of a church is echoed by the problem with leadership terminology. Those following a transformational model do not tend to speak in terms of a transfer of leadership or a transfer of ownership. Leadership just seems to be a natural part of the dynamics that already exist in social networks.

For example, in one interview, the worker states:

Our idea, we think “church plant.” And you have to have a plurality of elders, and it's not happening like that. It's doing terrific. It's going along existing ways of gathering (GTFP, Interview 82. 2007).

This view of leadership might explain why Category 4, “gathering with own

leadership” has a much lower proportion of interviews represented in the transformational model.

Still other workers who were interviewed, particularly those following a transformational model, rejected the term “church planting” outright in favor of “gospel planting” or “gospel seed planting.” These subtleties of how workers perceive themselves and their work are difficult to draw out in a quantitative analysis. For this reason, Fruitful Practice Research uses a “mixed methods” approach of combining qualitative and quantitative analyses, drawing on the strengths of each.

Analysis of Churches Established By Team (CEBT)

Figure 3 shows the distribution of the individual responses for number of churches planted. Results are split to show attractional and transformational samples separately and to allow comparison. We removed five outliers from the data for this analysis. These data points were several standard deviations removed from the body of data for each church type. This usually indicates that there was a special cause for the outliers and that they are not represen-

tative of the main body of data.⁶ The special cases of these outliers will be discussed below, but first, let us look at the data with outliers removed.

Figure 3 (on previous page) shows that the values of churches established by team (CEBT) reported for the transformational sample are centered at a higher value (mean 5.4 churches established) than for the attractional sample (mean 2.1 churches established). Transformational results also show a wider spread, with attractional results clustered closer to the mean (and to zero). Follow-up statistical analysis, using a variety of techniques, showed a statistically significant difference between the two church planting approaches.⁷ The observations from Figure 3, as well as the follow-up analysis, indicate that for the CEBT measurement, workers in this sample who were following a transformational approach seemed to have planted more churches on average than those who followed an attractional model. There is clearly great overlap in the numbers, but the overall distributions have quite different shapes.

Discussion of Outliers in the CEBT Data

The outliers in the CEBT metric did not fit the bulk of the data for the two church models under comparison. When we returned to re-examine the audio interviews for these outliers, we found that one interviewee had been interviewed four times, with two of these interviews being categorized as attractional and the other two as transformational. Given this instance of the same worker giving four interviews, we looked at the rest of the data, and found that all other instances of multiple interviews by the same person had already been accounted for as representing only one data point.

We also noticed from our re-examination of this worker's interviews that while the interviewee did not express explicitly a fully-formed transformational model, she did indicate that the team and emerging groups of

believers were working through social networks. It seems from the interview that circumstances of persecution led believers and workers to focus on reproduction through social networks, oftentimes without the involvement of Westerners. This is characteristic of workers following a transformational approach. However, this worker and her colleagues also make decisions that follow a more attractional approach that would seem to inhibit growth through social networks. For example, the interviewee mentions the team's decision to send believers to an isolated



location for discipleship by Christian-background believers from a related language group, a practice that would be likely to introduce unfamiliar ecclesiastical terminology and practices and lead to a break with the new believers' socio-cultural identity.

Given the ambivalence this worker has towards deliberately using practices that promote the movement of the gospel through social networks, this set of interviews would best be categorized as transitional. If that had been the case, it would have been left out of the statistical analysis in the first place. Therefore, we feel comfortable with its removal from the data set as an outlier. However, given the number of faith communities reported (50), and given the obvious movement towards a transformational paradigm on the part of the workers, this would be a valuable case to follow in the future as the movement matures and develops.

The second outlier was an interview concerning an internet-based ministry that was clearly following an attractional approach. The interviewee reported that through the internet ministry, many seekers and occasional "converts" were, after a period of testing for sincerity of faith, allowed to join an existing underground community. This seemed to contradict the information that he had reported in the written questionnaire (99 churches planted through the team's ministry). It could be that this worker interpreted the question about church planting more generally – for example, as the number of churches in the underground church network, rather than the actual number of churches planted as a result of the internet ministry. Due to this discrepancy, we are satisfied that it was best to leave this data point out of our analysis.

Further Considerations: Possible Influence of Other Variables

We compared fruitfulness for attractional and transformational models independently of other factors that might influence fruitfulness. For example, we have previously found with this dataset that using the local language is more highly correlated with fruitfulness than using a regional trade language (Adams, Allen and Fish 2009). As mentioned above, it would be ideal to use appropriate statistical methods to assess the impact on fruitfulness of both the network type and other potentially influential factors. The limited number of observations available prevented us from such a comparison of all factors' impact on fruitfulness; however, we were able to do individual "factor to factor" comparisons (correlations) between network type and each of the other potentially influential factors. This helps clarify the full extent of relationships between factors and avoids false conclusions from the data.

For example, if we found that workers employing the transformational model were using the local language more

often than workers employing the attractional model, we would be unable to determine whether an observed difference in fruitfulness was due to the model type used, the language used, or both. This is typical of studies of correlation between factors with potential influence on an outcome: the data, by themselves, can identify relationships, but they cannot establish causation.

In our study, we examined 58 factors for which we had data from the original dataset. Factors examined included gender, age of worker, number of adults on team, number of years the team has been on the field, number of years in which there has been a church planting effort among the people group, urban versus rural environment, team use of the heart language, and a host of other characteristics of the most mature planted community. The only correlation to network type that showed strong statistical significance was the C-scale assessment (Travis 1998) of the planted community. A disproportionately high number of teams using the transformational model indicated that the community they had established was C5.

Using this same dataset, Brown et al (2009) have shown that there was a relationship between position on the C scale and whether or not the worker reported that the team was seeing signs of a movement, with C4 and C5 positions on the C scale showing a greater likelihood of a movement.⁸ It is significant to note that Brown et al suggest that one of the main reasons for the correlation between seeing signs of a movement and C scale is that, at higher levels of contextualization, there is a greater likelihood that new believers will not be extracted from their social networks. The correlation between C scale and paradigm type noted above is consistent with that statement.

Suggestions for Further Research

The differences between the two types of church models that we can see in

A *disproportionately high number of teams using the transformational model indicated that the community they had established was C5.*

our analysis indicate a need for more extensive investigation. Some statistical tests cannot be performed on small samples, and the ability to extrapolate results to the population being studied is limited when the sample size is small. Therefore, future research would ideally include a larger sample.

As mentioned earlier, the coding process by Gray and Gray entailed a certain amount of subjectivity. In addition, the CP and PCP metrics were self-defined by respondents, leaving room for inaccuracy. The CEBT metric is likely to be less subjective, but was also self-reported. A larger sample would help to correct for this, as would a more carefully crafted survey instrument.

It would be useful for research to include specific questions to determine the type of church model being followed by respondents. Interviewers should also be trained to ask questions that would enable participants to express their church planting model in terms of social networks. Care should be taken that less conventional forms of church (such as those that do not meet regularly at a particular time and place) are taken into consideration. This might involve re-thinking the church planting continuum used in the Fruitful Practices surveys. It would also be of interest to study the relationship of intentionality of paradigm to the fruitfulness of those following each model, as many of the subjects did not seem to consciously hold to their particular church model.

Environmental details should be taken into consideration so that those interpreting results can determine whether certain situations more conducive to a transformational or an attractional model. It would also be valuable to look at the longevity and durability of faith communities planted under the two models.

In spite of drawbacks in instrument design and challenges in the process of data analysis, this phase of research has raised important questions and allowed us to make some important preliminary conclusions. Additionally, it will be valuable to compare the data collected in this set of surveys and interviews with future data.

Conclusion

Returning to our research question, what can we say about the relationship between attractional versus transformational church planting approach and the number and characteristics of churches planted?

Our analysis of this dataset suggests that workers following a transformational approach tend to plant more churches and are generally further along on the church planting continuum than those following an attractional approach. The number of workers following an attractional approach seems to peak at Category 3 of the church planting continuum, the “gathering” stage. This makes sense given the emphasis on gathering in the attractional model. On the other hand, the data indicates that both types of church planting model show signs of a movement to a similar degree. An important next step would be to understand in greater detail the characteristics of communities established by those who reported signs of a movement and to collect more evidence to examine the paradigmatic influence at this highest level of fruitfulness.

Implications

If the goal of any church planting endeavor is to facilitate movements of Muslim followers of Christ, then the cross-cultural workers involved in such endeavors will seek to move their ministries closer towards the right-hand side of the church planting continuum in Figure 2. Whether workers

are operating from an attractional or a transformational model, they will need to move beyond discipling and gathering toward activities that promote a movement to Christ.

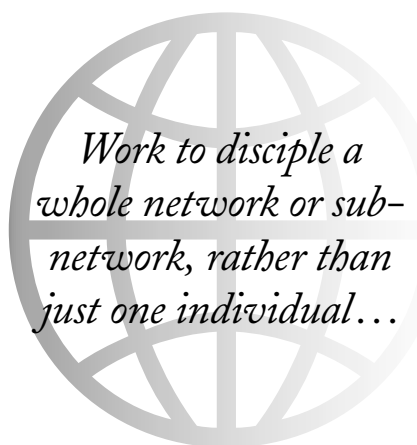
Since facilitating the movement of the gospel through natural social networks seems to be correlated with planting more churches and with churches that are farther along on the church planting continuum, there are some insights we can borrow from those following the transformational model that are worth considering in church planting efforts. While workers will need to prayerfully consider the implications for each specific context, here are a few suggestions to get started:

1. Make use of factors that will promote acceptability and spread of the gospel message in the wider community. Adams, Allen and Fish (2009) mention the following factors which, among others, have been demonstrated to be associated with fruitfulness in church planting:
 - a. use of vernacular language and fluency in it, including using familiar and understandable religious terminology;
 - b. use of storying and oral communication forms; and
 - c. behaving honorably according to local customs.

The particulars of how to work through these factors will depend on each situation and network.
2. Show that the scriptures are relevant to the whole community by addressing felt needs in the community. Take the time to think through which teachings in the Bible address these felt needs.
3. Rather than simply “gathering” unrelated individuals, work to facilitate the transformation of existing social networks and to bring whole networks intact into the kingdom of God. Seek to adopt models of influencing networks (*oikos*)⁹ through

addressing people of influence and so-called “men and women of peace” (Patterson and Scoggins, 2003).

4. Minimize the distinction between evangelism and discipleship. This would mean helping seekers and emerging believers to put into practice what they are learning from the scriptures right from the beginning, even before they have made a profession of faith in Christ. Encourage seekers and new believers to share what they are learning from the scriptures with people in their social net-



works. Work to disciple a whole network or sub-network, rather than just one individual, even before anyone has professed faith in Christ.

5. Encourage believers to retain their socio-religious identity to an extent that allows them to remain within their social networks as witnessing followers of Jesus Christ. In many cases, this means a C4 or C5 identity, both of which are strongly associated with movements of reproducing faith communities. See Brown et al (2009), and in particular the charts on page 22. **IJFM**

References

- Adams, Eric, Don Allen, and Bob Fish
2009 Seven Themes of Fruitfulness. *International Journal of Frontier Missiology* 26, no. 2: 75-81.
- Brown, Rick, Bob Fish, John Travis, Eric Adams, and Don Allen
2009 Movements and Contextualization: Is There

Really a Correlation?

International Journal of Frontier Missiology 26, no. 1: 29-32.

GTFP. *Interview* 53, 82. GTFP Conference. Thailand. March 2007.

Gray, Andrea, and Leith Gray
2009 Paradigms and Praxis (Part 2): Why Are Some Workers Changing Paradigms? *International Journal of Frontier Missiology* 26, no. 2: 63-73.

Josephus, Flavius

2010 *Antiquities of the Jews*, William Whiston, translator. (1737). Electronic document, <http://sacred-texts.com/jud/josephus/index.htm#a0j>, accessed June 3.

Lewis, Rebecca

2009 Insider Movements: Honoring God-given Identity and Community." *International Journal of Frontier Missiology* 26, no. 1: 33-36.

Michel, O.

1976 Oikos. In *Theological Dictionary of the New Testament (electronic edition)*, by G. Kittel, G. W. Bromiley and G. Friedrich. Grand Rapids: Eerdmans.

Patterson, George, and Richard Scoggins
2003 *Church Multiplication Guide*. Pasadena: William Carey Library.

Philo

2003 In Flaccus. In *Philo's Flaccus: The First Pogrom. Introduction, Translation and Commentary*, by Pieter W. van der Horst. Leiden: Brill.

Travis, John

1998 The C1 to C6 Spectrum: A Practical Tool for Defining Six Types of “Christ-centered Communities” Found in the Muslim Context. *Evangelical Missions Quarterly*, October: 407-408.

Weigandt, P.

1993 Oikos. In *Exegetical Dictionary of the New Testament*, by H. R. Balz and G. Schneider, 1993. Grand Rapids: Eerdmans.

Woodberry, J. Dudley, ed.

2008 *From Seed to Fruit: Global Trends, Fruitful Practices, and Emerging Issues among Muslims*. Pasadena, CA: William Carey Library.

Endnotes

¹ For a description of the sample for this research project, see Woodberry 2008, especially pp. i-ii, viii. To contact the Fruitful Practice Research team, write to info@fruitfulpractice.org.

² The sample size (33 interviews, of which 28 were unique individuals) that

Gray and Gray analyzed (2009) was too small for most statistical tests. They were asked to code the remaining interviews in the database according to church planting approach. Gray and Gray did not have access to the survey results, so they were not aware, for example, of the number of churches planted by the various workers being interviewed. This helped prevent bias in coding. Ideally, the interviews would have been coded by three people, with any discrepancies resolved by a mutually agreed-upon solution.

Some of the interviews did not fit clearly into one category or another, so only those that were clearly attractional or transformational were included in the final data set. In addition, some individuals gave more than one interview. In these situations, the interviews were treated as one data point. The final data set contained 76 respondents. One situation in which multiple interviews were not identified as being given by the same respondent caused a situation of “outliers,” or data points that were not representative of the data. This situation is discussed in the text of the article.

For the purpose of this analysis, it was assumed that the individual giving the interview was representative of his or her team. This was not an arbitrary assumption; qualitative observations revealed that those giving the interviews spoke highly of their team mates and tended to use the pronoun “we” in describing their work. Additionally, many of them were team leaders and/or in a mentoring relationship with other team members. This impression of team homogeneity may not match up with reality, as it is possible that members of the same team might be operating according to different church planting models, which would make it difficult to categorize the churches planted by the team as a whole. Now that we are aware of the importance of church planting models, those collecting data for the Fruitful Practices project can include specific and explicit questions regarding models on future surveys and in future interview sessions. Researchers can also ask questions to determine the extent to which team members agree among themselves on church planting approaches.

Each field team was only represented once in the final data set. We could determine this from geographical and other descriptive information that was included with most of the interviews.

³ Standard Chi-Square and Fisher’s Exact Test methods showed significance

at an approximate 0.1 level. Since significance values closer to zero imply a stronger likelihood of a difference between the two church model types, a result of 0.1 indicates mild evidence of a difference, possibly limited by the small sample sizes available.

⁴ Note, however, that the sample size is again small for the transformational group.

⁵ Follow-up tests using standard Chi-Square and Fisher’s Exact Test methods resulted in a significance level of 0.05. This level indicates a strong difference between the two types of church planting models.

⁶ The outliers were the following: four recorded values of 50 (which, it turns out, was one respondent who was interviewed four times, two of these interviews having been placed in the attractional category and two in the transformational category) and a recorded value of 99 for an interview placed in the attractional group.

⁷ Follow-up tests (standard t-test, t-test on transformed data, nonparametric tests) reinforced the observation of the difference shown in Figure 3. Analysis confirms that the two church types mean CEBT values have a strong, statistically significant, difference. The t-tests produced significance well below 0.01; significance of the nonparametric tests (Kolmogorov-Smirnov, Kruskal-Wallis) were in the 0.05 range.

⁸ As a part of this study, we conducted a detailed analysis of the relationship between which position on the C Scale respondents indicated the churches they had established could be classified and the three fruitfulness indicators used in this study (0, 1, or >1; number of churches planted; maturity of fellowships). We found that these three factors were not related to position on the C scale. However, when we looked separately at those fellowships that show signs of a movement (Category 6 in the PCP metric), we discovered that showing signs of a movement is related to a higher level of contextualization, as measured by the C scale. We continue to use the C Scale as there is not yet a standard alternative, but we recognize that this uni-dimensional scale does not adequately categorize or describe identity issues.

⁹ The Greek words *oikos* and *oikia* are used to refer to “house” (literally, in Matthew 7:24; and figuratively, in John 14:2) and “household” (a social unit, as in Philippians 4:22), and is sometimes translated “family” (Acts 16:34). The relational sense (household) of the term is used in various ways in classical Greek, as well as in Old and New Testament

passages. In its narrow sense, it would include those living in the same house or compound, such as family members, household servants, and business workers (Philo, In. Flacc., 35; Josephus, Ant., 17, 42). In a wider sense, however, it can encompass those in the same relational community, including relatives, business workers, and other key relationships, even those in another town as in Luke 2:4. (See also Michel 1976, Weigandt 1993.)