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Philip R. Magaletta

Federal Bureau of Prisons, pmagaletta@bop.gov

Rokas Perskaudas

The Catholic University of America

Christina J. Connors

Saint Mary's University


Marc W. Patry

Saint Mary's University

Jarrold Reisweber

Veterans Affairs

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Pilot Testing the Daily Activities List for Inmates (DALI): Item Evaluation and Content Validity

Philip R. Magaletta
Federal Bureau of Prisons, Washington, DC

Rokas Perskaudas
The Catholic University of America and Federal Bureau of
Prisons, Washington, DC

Christina J. Connors and Marc W. Patry
Saint Mary's University

Jarrod Reisweber
Veterans Affairs, Richmond, Virginia

Alix McLearn
Federal Bureau of Prisons, Washington, DC

Scheduling enjoyable daily activities is a Cognitive Behavioral Therapy intervention used in the treatment of depression and substance abuse disorders that are prevalent disorders among inmates. To effectively use this intervention with inmates, an activities list with items ecologically sensitive to the correctional setting needs to be created. The purpose of this study was to develop and evaluate items; thus, establishing a content valid Daily Activities List for Inmates (DALI). Fifteen corrections professionals representing a wide range of disciplines and managerial backgrounds served as subject matter experts (SMEs). Each SME evaluated 403 daily activity items that were aggregated from 4 separate lists. Each item was evaluated in relation to appropriateness for corrections, availability to inmates, need for editing, and where the activity could take place (in cell, out of cell, or both) then analyzed for removal following a criteria-driven, stage-based approach. The final daily activity list consisted of a total 227 items with the majority of the items developed by inmates in a correctional environment enduring through each stage. The majority of all 227 final DALI items were also considered to be used as both in and out of cell activities. An additional 22 items were created through SME suggestions or edits and were reserved for possible future use. With an ecologically sensitive daily activities list for inmates developed, implications for using the DALI to deliver psychological services to inmates are discussed.

Keywords: inmates, behavioral activation, corrections, measures

There is growing consensus among public policymakers and corrections researchers that inmate accountability and psychological services and strategies that support responsible living must be developed and pursued (Gendreau, Listwan, Kuhns, & Exum,

2014). One such strategy, derived from Cognitive Behavioral Therapy (CBT), is behavioral activation (Beck, 2011). It is built upon the premise that enjoyable events, experiences, and activities exist in a person's environment and can provide a natural set of positive reinforcements and agency experiences that allow for the regulation of moods, emotions, and attitudes (Dimidjian, Barrera, Martell, Munoz, & Lewinsohn, 2011). Daily enjoyable activity scheduling is a behavioral activation strategy and it has twofold relevance in the correctional setting. Specifically, it can be used to treat psychological disorders. More generally, it can be developed to structure inmate accountability strategies and practices.

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For example, research on daily activity scheduling in the context of CBT has demonstrated effectiveness in the treatment of Major Depressive Disorder (Beck, Rush, Shaw, & Emery, 1979; Dimidjian et al., 2006). Within both individual relapse-prevention models and group-based therapeutic community approaches, the use of daily activity scheduling has been demonstrated to be an essential element of effective substance abuse treatment and the maintenance of recovery based lifestyles (DeLeon, 1997, 2000; Marlatt & Donovan, 2005; Miller, Forcehimes, & Zweben, 2011; Sobell & Sobell, 2000). Furthermore, reentry research consistently demonstrates that the use of leisure and recreational activities impacts recidivism (Girard & Wormith, 2004; Wooditch, Tang, & Taxman,

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Philip R. Magaletta, Federal Bureau of Prisons, Washington, DC; Rokas Perskaudas, Department of Psychology, The Catholic University of America, and Federal Bureau of Prisons; Christina J. Connors and Marc W. Patry, Department of Psychology, Saint Mary's University; Jarrod Reisweber, Veterans Affairs, Richmond, Virginia; Alix McLearn, Federal Bureau of Prisons.

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Correspondence concerning this article should be addressed to Philip R. Magaletta, Federal Bureau of Prisons, 400 First Street, NW Washington, DC 20534. E-mail: pmagaletta@bop.gov

2014). Specifically, studies indicate inmates reporting fewer leisure and recreational activities on the Level of Service Inventory—Revised (LSI-R; Andrews & Bonta, 1995, 2010) and the Level of Service/Risk-Need-Responsivity instrument (LS/RNR; Andrews, Bonta, & Wormith, 2008) are more likely to recidivate compared with those who have more frequent engagement in these activities (Canales, Campbell, Wei, & Totten, 2014; Palmer & Hollin, 2007). Similarly, a recent study on paroled lifers¹ found the prime factor separating those who desisted from crime and those who were reincarcerated was the inmate's sense of agency (Liem & Richardson, 2014). In other words, inmates who held higher levels of the belief that they were capable of acting independently and making their own choices had lower recidivism rates. Being able to practice such agency and accountability during incarceration is conceivably a valuable and important reentry service.

Whether used as a treatment service for inmates with psychological disorders or to develop general leisure time practices to build accountability and positive agency in the correctional environment, activity scheduling may potentially work to foster connections between behaviors and changes in cognition and attitude (Jacobson et al., 1996). It may also increase inmates' positive engagement in their environment while simultaneously decreasing problematic behaviors by reducing the emotional distress that emerges from idleness, social withdrawal, and other potentially negative coping behaviors (Dimidjian et al., 2011; Wenzel, 2013). Despite the importance of achieving such results, however, a problem remains. Although there is empirical support for the use of CBT approaches (i.e., correcting criminal thinking errors and improving self-regulation) in reducing recidivism (Bush, Glick, & Taymans, 2011; Van Voorhis & Salisbury, 2012), no research has been specifically conducted on activity scheduling in the correctional environment. Correctional settings are unique, and clinical tools such as daily activity lists must demonstrate ecological fit if they are to be useful to the clinicians and inmates who will use them. For example, recommending to a depressed, incarcerated individual that they complete an activity that is not available to them could be demoralizing. One method to develop and establish environmental fit is to have subject matter experts' pilot test items before psychometric evaluation research with inmates and encourage accurate reflection of the types of reinforcers available in the correctional setting. Following such a procedure, inmate ratings of these items can be pursued.

Thus, the purpose of the current study was to initially develop a list of daily activities that could be evaluated for ecological sensitivity and content validity. Using a systematic approach to the development of items, we pilot-tested an extensive item pool for the Daily Activities List for Inmates (DALI) by combining and then reducing items from four distinct daily activity lists. Two of the lists were developed in the general community and two were developed by inmates as part of a treatment intervention. None of the four lists had been subject to systematic empirical exploration in correctional settings. Subject matter experts with both general correctional and specific professional expertise were enlisted to evaluate the content of each individual item for accuracy and completeness in representing possible inmate activities. This evaluative procedure allowed us to aim toward our overarching goal—the production, through item evaluation and reduction, of an ecologically sensitive and content valid item list that could be scaled for use with inmates across a range of correctional security levels

and settings, as well as, in and/or out of an inmate's cell, and with male or female inmates.

Method

Subject Matter Experts

Because no daily activity lists are empirically validated in a correctional setting we sought to establish a thorough and foundational procedure for determining the ecological fit of items for this unique setting. This required pilot testing various items from existing activity scheduling lists with correctional subject matter experts (SMEs) as raters. Three criteria for SME inclusion, as outlined by Dimitrov (2012), were chosen in service of this goal: (a) raters were familiar with the target population of consumers who would use the items, in this case inmates; (b) raters possessed expertise in the constructs of interest behind activity scheduling (i.e., behavioral activation, accountability, general and specific correctional operation and policies); and (c) raters were potential downstream administrators of the fully developed item list with inmates. Although these criteria were meant to be cumulative across the SME group, the majority of the SMEs met all three criteria.

Overall, 17 correctional SMEs from the Federal Bureau of Prisons (BOP), were invited to participate in the rating of items and 15 participated by returning completed protocols (88.24%). In terms of general correctional expertise, the responding SME group ($n = 15$) reflected a combined total of 238 years of experience practicing in corrections ($M = 15.87$, $SD = 5.94$). The majority (80%) had experience with inmates classified to all of the institution security levels managed by the Federal Bureau of Prisons (BOP; i.e., minimum, low, medium, high, and administrative security levels). The remaining three SMEs had varied experience. For example, one worked only at a low security institution, another had experience with all levels except low, and one worked only at minimum and medium security levels. The SMEs represented experience in a wide number of correctional institutions that covered all six geographical regions of the federal prison system (Southeast, Western, North Central, South Central, Northeast, and Mid-Atlantic). After compiling these correctional institutions and removing duplicates, a total of 47 unique institutions were endorsed as correctional practice settings over the course of the SMEs careers. These included low and medium security level correctional institutions ($n = 20$), administrative security detention centers ($n = 8$), high security penitentiaries ($n = 7$), low security prison camps ($n = 7$), administrative security medical centers ($n = 3$), and federal correctional complexes ($n = 2$), which incorporate multiple security levels and inmate populations. Although not represented in our counts for correctional settings with inmates, many SMEs also had significant employment experience in training centers, regional offices, and the BOPs central office headquarters across their careers.

¹ Defined by Liem and Richardson (2014), paroled lifers are individuals who “committed a homicide in the Boston or Philadelphia metropolitan area, but had been paroled or released from a life sentence for this offense over the past 15 years, and were either not currently incarcerated or were currently re-incarcerated” (p. 694).

In terms of discipline-specific professional expertise, the SMEs ($N = 15$) formed a multidisciplinary team representing the following professional backgrounds and groups: psychology ($n = 4$), law ($n = 3$), education ($n = 2$), custody ($n = 2$), food service ($n = 2$), medicine ($n = 1$), and recreation ($n = 1$). Furthermore, SMEs were categorized according to their current positions during the time of rating. The majority of the SMEs (53.33%) held positions at individual institutions. Two of these were at the executive level (i.e., Associate Warden), 4 at the supervisory level (i.e., Chief Psychologist, Foreman), 1 as a coordinator, and the remaining SME as a front-line psychologist. The remaining SMEs (46.67%) each had field experience and currently held administrative positions at the following locations: 5 were currently at the BOP headquarters, 1 worked out of a regional office, and 1 worked at a national training center. Finally, the majority (80%; $n = 12$) of the SMEs had correctional practice experience with both male and female inmates. The remaining three had corrections experience with only male inmates. The protocol completed by each SME were initially aggregated from items in the four measures described next, with the procedures used to create the protocol following.

Measures

The Pleasant Events Schedule (PES; MacPhillamy & Lewinsohn, 1974; MacPhillamy & Lewinsohn, 1982). The PES is a 320-item list of pleasant activities that are rated for their frequency of occurrence and their subjective enjoyability for the general community (MacPhillamy & Lewinsohn, 1982). The scale has demonstrated substantial validity and reliability in studies using community and clinical samples of depressed adults (Lewinsohn & Amenson, 1978; Lewinsohn & Graf, 1973; MacPhillamy & Lewinsohn, 1982). Originally, items were developed to facilitate mood regulation interventions with adults, but use soon expanded beyond studies of depressed adults, to include those with substance use disorders (SUD). These later studies revealed significant differences in activity levels between cocaine abusing or dependent outpatients and healthy controls (Van Etten, Higgins, Budney, & Badger, 1998). Furthermore, this trend of decreased nonsubstance related activities was correlated with increased substance use in nondisordered college samples (Correia, Carey, & Borsari, 2002; Correia, Simons, Carey, & Borsari, 1998).

Of particular note to the current study, despite the relatively wide use of the PES, modifications have been made since its inception. The majority of these modifications were designed to more adequately measure leisure activities among specialized populations, such as older adults and those with Alzheimer's (Logsdon & Teri, 1997; Rider, Gallagher-Thompson, & Thompson, 2004; Teri & Lewinsohn, 1982; Teri & Logsdon, 1991). Others have noted that the PES consumes too much time to administer (approximately 60 minutes), contains too many items focused on nonbehavioral, immoral, or substance abuse connotative activities, and is not up-to-date regarding the abundance of new activities that modern innovation has yielded, like computer use (Roozen et al., 2008).

The Pleasant Activities List (PAL; Roozen et al., 2008). The PAL is a general community 139-item list of behavioral activities that are rated for frequency and enjoyability from the past 30 days and was developed to address several of the concerns

mentioned with the PES. The PAL items are rated along a 5-point Likert scale, as opposed to the 3-point scale in the PES. The instrument takes about 30 minutes to administer, and has been demonstrated to possess adequate reliability and discriminant validity between substance abusing and nonsubstance abusing respondent samples. Using a substance abusing and matched community sample, the authors stressed the importance of accounting for the characteristics of specialized populations in developing valid assessment tools in general and activity lists in particular.

The Mind Freedom Plan (MFP; Reisweber, 2011a). The MFP is a clinical tool used to structure a brief, clinician guided CBT intervention with inmates. Used in a single session to teach inmates better mood monitoring skills and coping skills, the MFP introduces and provides guided practice with basic cognitive-behavioral strategies, including daily activity scheduling. The MFP includes a list of 100 daily activities that can be scheduled to help alleviate boredom, stabilize mood, and increase adjustment. The initial list of items developed and placed into the MFP were suggested by the inmates in the prison where the intervention was being used. Although these items had initial clinical utility for the individual inmates who nominated them (a common practice among clinicians who are establishing the use of behavioral activation for adjustment disorders, or in the treatment of depressive disorders) the items have yet to be systematically explored at the level of ecological fit and content validity by subject matter experts.

The Mind Freedom Plan–Special Housing Unit (MFP-SHU; Reisweber, 2011b). The MFP-SHU is part of a psychological intervention that has been used with inmates in special housing units. It is similar to the MFP above, but used for those who would benefit from mood stabilization and adjustment increases while in a special housing unit. It includes guided homework exercises for inmates, includes basic cognitive-behavioral strategies for mood monitoring, and includes a list of 71 daily activities suggested by inmates within restrictive housing settings where the intervention was being used. Again, while these items had initial clinical utility for the individual inmates who used them to structure their daily activities while in their cells during a stay in restricted housing, the items have yet to be systematically explored at a more encompassing level of ecological fit and content validity by SMEs.

Procedure

A merged list of 630 activity-items was created by compiling items from the four measures. Because the study was limited to establishing an ecologically sensitive set of content valid items that could be used in a list of daily activities for inmates, all scaling of items used in the original measures were removed. Verbatim duplicate items ($n = 93$) and nearly verbatim items ($n = 11$) across measures were collapsed, reducing the summative list from 630 items to 526 unique items.² Next, two of the authors (P.R.M. and A.M.) with corrections expertise independently reviewed items to determine activities that were explicitly prohibited and, thus, inappropriate (drinking, kissing, full-contact sports, etc.), or unviable in a correctional environment (snow-

² Although duplicate items were removed, we did retain information in our database on the source of the item. This allowed us to provide final reporting for each individual measure as to the percent of items appearing in the final daily activity list for inmates.

mobiling, hiking, etc.). Items considered appropriate and viable based on a 100% consensus were retained. Items that were endorsed as inappropriate or unviable by both reviewers were removed ($n = 101$). Items with discrepancies between the two reviewers were gathered for discussion ($n = 57$), but not yet removed. These discrepant items were removed if 100% consensus on inappropriateness or unavailability was achieved following discussion ($n = 22$); otherwise the item was retained for SME rating, thus producing a list of 403 items.

Next, item evaluation categories that allowed for content analysis were created. Three evaluation categories were chosen: appropriateness for the corrections context; availability across a range of facilities; and, edits to language more appropriate to corrections setting required. The evaluative progression for each item was hierarchically related; progressing from the initial evaluation of an item on whether it was an appropriate fit according to the general and specific policies of a correctional environment then determining the availability of that item at their institution(s) before considering whether the specific language of the item requires adaptation.

Because each of the 403 items was individually assessed for ecological fit along the three evaluation categories there were 1,209 ratings that would be required from each SME. For ease of rating and subsequent data entry, a negatively worded rating system was designed. Specifically, the SMEs were asked to, "Indicate if, based upon your own career experiences and subject matter expertise, the activity is. . . . "Inappropriate (yes/no)," "Unavailable (yes/no)," or "Edits required (yes/no)." The categories were organized in a response grid where the SMEs could record their evaluation of each item with a check mark indicating a "yes." Thus, items marked "yes," because of the negative wording of the evaluations were eligible for item reduction.

A final evaluation category was also included to assess item generalizability across correctional settings by asking SMEs if each activity item could be conducted in a cell, either in-or-out of a cell, or out of a cell. At the end of the evaluation, the SMEs were prompted to generate any additional daily activity items not already present within the existing list that inmates can engage in during a routine day at their current facility without compromising the safety or security of the institution. Evaluation protocols were distributed to SMEs in either digital or hardcopy format according to their preference. When all protocol rating forms were collected, data were entered into a database and paper versions scanned for digital archiving.

Analytic Plan

In terms of analytic plan, a multistage process for item reduction and evaluation was developed. In Stage 1, at least 2 of the 15 SMEs had to indicate an item was either inappropriate or unavailable across correctional settings for an item to be removed. This threshold was chosen as it represented the most conservative index while simultaneously reducing outlier rater bias. It also resulted in a 90% consensus rate across raters for item retention and progression to Stage 2. In Stage 2, we analyzed ratings for the remaining items regarding whether an item required edits. Again, a comparable 90% consensus rate threshold for fit was utilized in this stage to denote items that required edits, meaning that at least two or more SMEs had to independently rate an item for editing. In Stage 3, remaining items were evaluated for use primarily as in-cell, either in-or-out, or out-of-cell activities according to a simple majority rating threshold.

Results

Approximately 10% of the items were chosen at random and checked for data entry accuracy across all 15 subject matter experts, equaling 600 individual ratings. Fidelity analysis revealed only 1 omission error out of the 600 ratings checked (.17%). Additionally, there were four aesthetic modifications made (.67%) that revolved around spelling, placement, or grammar of edit suggestions but did not indicate an error detrimental to data integrity (i.e., missing or erroneously entered ratings). The overall rate of both errors and modifications together is extremely low at less than 1% (.83%), indicating that data entry was predominately accurate.

Our multistage analysis to isolate category ratings and refine the 403 item list is presented visually in Figure 1. In Stage 1, a total of 172 items (42.68%) were removed from the initial list of 403 items submitted for evaluation. Of these 172 items, 39 items (22.67%) were removed because of being rated primarily as inappropriate, 126 items (73.26%) were removed because of being rated primarily as unavailable, and 7 items (4.07%) were removed through an equal mixture of inappropriate or unavailable ratings by two or more SMEs.

In Stage 2 we analyzed ratings regarding whether the language of each item that did not fall beneath the 90% threshold in Stage 1 (i.e., removal based on appropriateness/availability) was applicable to a correctional environment. In total, 17 items (7.36%) were removed from the item pool of 231 following Stage 1 and compiled according to the recommendations proposed by each SME that endorsed the item for editing. The compiled items were then cross examined by two of the authors (R.P. and C.J.C.) according to a 100% consensus model for retaining the edited item in the final list. Minor edits for clarity that did not significantly change the inherent nature of the item were applied to a total of 13 items (76.47%), which were subsequently added back to the item list, while the remaining 4 items (23.53%) were ultimately removed because of redundancy with other items following editing. Furthermore, 22 write-in items provided by the SMEs were reviewed in this stage, but not included in the final list as they were not subject to the full 15 SME item evaluation process for content validity. They are instead retained for potential use in future studies.

In the final stage, all of the items that passed through the previous iterations ($N = 227$) were analyzed according to the context in which they could potentially occur (i.e., in or out of cell). In total, 8 items (3.52%) were rated as primarily in-cell activities, and largely included basic cell hygiene activities (e.g., "Take a nap," "Organize your locker," etc.). The preponderance of items (176; 77.53%) were rated primarily as activities that could potentially be conducted either in-or-out of a cell. Forty-three items (18.94%) were denoted as primarily out-of-cell activities, such as "Attend program" and "Talking on the telephone." Additionally, two items were evenly split between strictly out-of-cell and either in-or-out of cell activities. These two discrepant items ("Seeing good things happen to my family of friends" and "Receiving money in my account") were ultimately forced into the either in-or-out of cell category for ease of interpretation. See Appendix for a full listing of the final 227 DALI items arranged by in-cell, either in-or-out, and out-of-cell.

Final analyses were conducted to parse out the item retention patterns by measure source. By examining each item, it was determined that 27 items were uniquely retained from the MFP (27.00%); 42 items were uniquely retained from the MFP-SHU (59.15%); 97 items were uniquely retained from the PES (30.31%); and 13 items

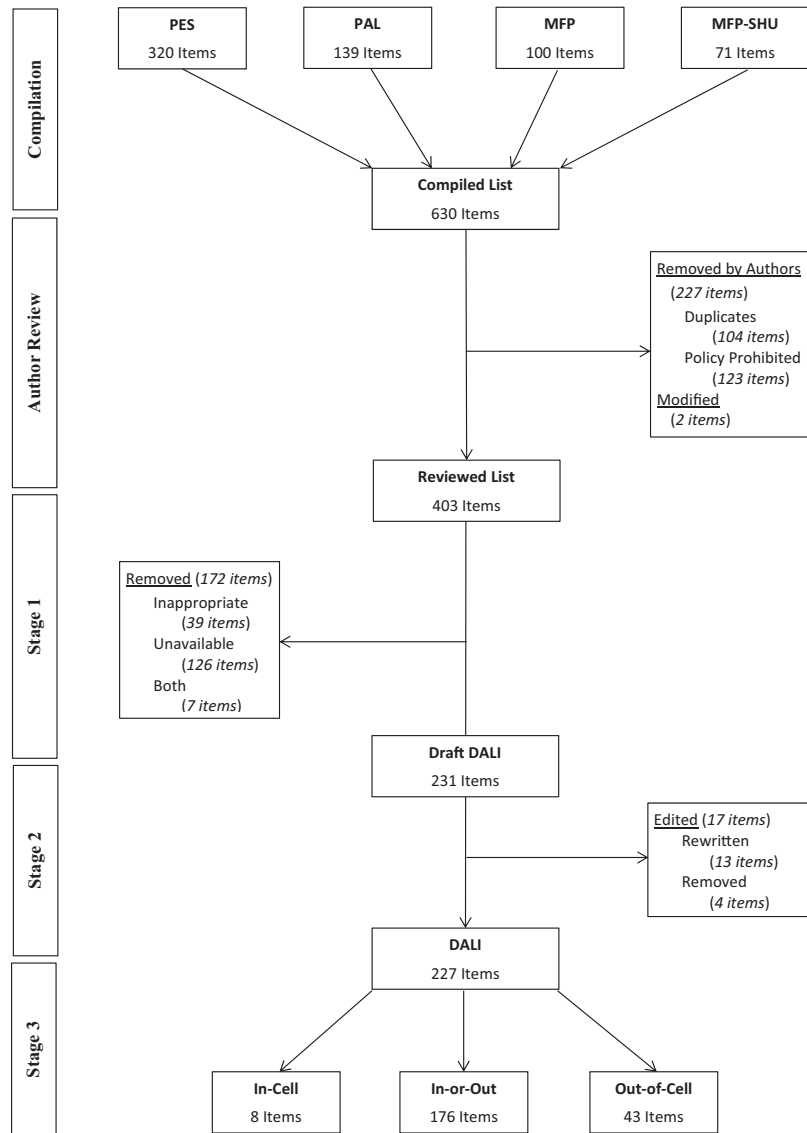


Figure 1. Multistage item reduction and evaluation process. PES = The Pleasant Events Schedule; PAL = The Pleasant Activities List; MFP = The Mind Freedom Plan; MFP-SHU = The Mind Freedom Plan–Special Housing Unit; DALI = Daily Activities List for Inmates.

were uniquely retained from the PAL (9.35%). However, a considerable number of items ($n = 48$) were sourced from more than one list. Higher order labels were subsequently derived to aid interpretation. An item was considered as originating from the “Community” if it was originally part of either or both the PES/PAL but not on either or both the MFP/MFP-SHU. An item was considered as originating from “Corrections” according to an identical coding scheme but with the measures switched. Whatever items did not fit into this dichotomy were labeled “Mixed Source” (i.e., any amalgamation of PES/PAL with MFP/MFP-SHU).

The Community/Corrections/Mixed overlay allowed for a more concise exploration of what types of items progressed through the content validation process at each stage (see Table 1). For example, after accounting for duplicates that were merged, 100% of the items removed in the initial author review for policy-prohibited,

inappropriate activities ($n = 123$) originated in the community measures. Moreover, the majority of the items (66.12%) solely originating in the community were ultimately removed by SMEs, while, conversely, the majority of the items developed from inmate sources in the correctional environment (66.67%), and more than half of the items developed in both a correctional and community environment (58.70%), eventually made it into the final DALI.

Discussion

This study achieved the goal of reducing a large, varied source, original item pool to yield a smaller, ecologically sensitive, and content valid daily activity list for inmates. The use of corrections professional SMEs representing both general corrections management and discipline-focused correctional expertise allowed us to establish

Table 1
Daily Activities List for Inmates (DALI) Item Retention by Stage and Source

Stage	Total ^a		Community ^b		Corrections ^c		Mixed ^d	
	<i>n</i>	%	<i>n</i>	%	<i>n</i>	%	<i>n</i>	%
Author review	403	76.62	243	66.39	114	100.00	46	100.00
Stage 1	231	43.92	125	34.15	78	68.42	28	60.87
Stage 2	227	43.16	124	33.88	76	66.67	27	58.70

Note. Percentages and counts are compiled following each stage so that % = percentage retained. Author review = consensus removal by two authors (P.M. and A.M.) of activity items explicitly forbidden by policy (e.g., drinking alcohol). Stage 1 = subject matter expert (SME) evaluation of activity items according to appropriateness and availableness in correctional environments. Stage 2 = SME denotation of activity items for editing/merging; resulted in final version of DALI.

^a Initial *n* = 526 following merging of duplicates. ^b *n* = 366. ^c *n* = 114. ^d *n* = 46.

two key aspects of content validity: representativeness and relevance (Dimitrov, 2012; Lennon, 1956; Messick, 1995). The collection of validation evidence from the SMEs allowed us to examine the ecological fit from a broad, representative vantage point of multiple professionals and within the corrections system. In addition, we were able to account for the changes they thought would be necessary to improve the list and make it relevant, accurate, or complete. Given the professional backgrounds of the raters, items might have been edited to achieve increased relevance to the corrections setting. Including items originally sourced from inmates helped build the representativeness of items that would be relevant to inmates on the final list.

This basic, parsimonious methodology is a necessary step in developing a tool with clinical utility. An expert derived item evaluation is a necessary first step for tools that hope to achieve clinical use and relevance in correctional settings. When subject matter experts who are professionals, researchers, and administrators are asked to communicate judgments as potential users of a tool, it promotes rapid diffusion and implementation within the system. In the case of a daily activities list, this process can help determine whether a range of professionals who might use this tool find the items appropriate for the prison environment or how accessible the activities are. Having documented this level of validation evidence, the field can move forward to develop usable products from the behavioral activation and enjoyable daily activity approach. Scheduling enjoyable daily activities from a list allows individuals to interact within their environment in a positive manner, while experiencing feelings of accomplishment.

With this basic research complete and our items established, applied research on scale development and functioning, as well as clinical work with the DALI can be pursued. Particularly when the items are scaled and rooted in behavioral activation principles they may inform psychological service delivery for several prevalent psychological disorders among inmates: Major Depressive Disorder, Substance Use Disorders, and Adjustment Disorder.

Past research of CBT use for the treatment of depression (DeRubeis et al., 2005; Gloaguen, Cottraux, Cucherat, & Blackburn, 1998) makes it easy to conclude that CBT is a desirable psychotherapy and psychological service. One key component of CBT is behavioral activation, which is built upon the premise that enjoyable events, experiences, and activities exist in the environment and provide a natural set of positive reinforcements and mastery experiences that allow the regulation of moods, emotions, and attitudes (Beck, 2011). Activity scheduling is one behavioral activation strategy that is relevant to the corrections environment. This technique encourages indi-

viduals to identify specific activities that are associated with enjoyment and accomplishment and that can be scheduled into their daily routine. Sometimes a list is used to remind them of what activities others have used or they might want to learn more about. When a menu of such activities is generated, they can be used systematically. For example, asking inmates to keep an activity log allows them to explore the connection between the activities they engage in and their mood state. Inmates might then begin to understand the connection between mood improvements and engaging in activities that bring them pleasure or accomplishment. With the activities decided upon, individuals then plan to engage (schedule) those activities and gain relief from their emotional distress.

In terms of substance abuse treatment approaches, coping interventions that feature activity scheduling have been used successfully in modified therapeutic communities, the most successful and frequently used substance abuse treatment approach in corrections (e.g., DeLeon, 2000). Daily activity scheduling by the individual may lead to gains in noticing and regulating affect and moods since those with substance abuse problems often have difficulties organizing time and regulating affect. Scheduling to systematically introduce enjoyable activities can also be designed by a psychological service provider to counter the chronic negative problem solving that often dominates the psychology of those early in their recovery journey. Such a technique has the added benefit of mirroring the type of group-based daily scheduling that is the hallmark of effective therapeutic communities (DeLeon, 1997, 2000; Marlatt & Donovan, 2005). In this vein, there may be additional service-oriented daily activities that can be included, as is often prescribed in the recovery-based approach to change. Working with others not as far along the path of recovery is seen as an enjoyable activity that can be used to support recovery and promote abstinence from drug use. For example, Wooditch, Tang, and Taxman (2014) recently reported that for substance abusing probationers, increased time spent engaging in healthy leisure and recreational activities was associated with less subsequent drug use.

Clinicians familiar with daily activity scheduling for inmates using validated scales might also be able to make a significant impact for inmates with adjustment disorders—a common psychological problem among first time or newly committed inmates (Dumond & Dumond, 2005). The process of incarceration can be stressful. Although individuals may have developed and practiced coping skills before being arrested and convicted, incarceration may introduce new or different types of stress. The coping methods used before incarceration may be different than those that are used or adapted during

incarceration. This new environment is exactly why coping tools relevant to the correctional setting are needed. The use of activity scheduling is basic engagement with the environment in ways that are pleasant and help build a sense of mastery; thus, facilitating adjustment.

Beyond psychological services that feature the use of behavioral activation through activity scheduling, reentry services may also be impacted favorably through research and practice in this domain. The very act of activity scheduling itself requires inmates to be active participants in their own care. If this participation can then be infused with practicing choices that emphasize accountability and build responsibility, the process of changing the criminal lifestyle can be envisioned. Here we must proceed cautiously, for the literature is literally littered with feel-good, keep-inmates-busy notions that are clearly found wanting when measured by the yardstick of recidivism (Latessa, Cullen, & Gendreau, 2002; Lowenkamp, Latessa, & Smith, 2006). Nonetheless, it is worth noting that there is a strong possibility that criminal thinking could be impacted by the use of this CBT approach in treating other clinical issues. It also has the potential to inform and expand the scant literature on leisure time activities that is part and parcel of developing prosocial supports and measures in common correctional risk-need tools such as the LSI-OR/R (Girard & Wormith, 2004) and the LS/RNR (Canales et al., 2014).

This investigation was designed to allow for the strongest inference toward external validity and, therefore, eventual adoption and generalizability to the broadest types of correctional facilities and types of inmates. This included a range of correctional professional SMEs who performed a systematic and rigorous process of determining the content validity of each item. Yet, despite these efforts to develop thoroughness in study design, the work is not without limitations. For example, with the initial item lists consisting of over 400 items SMEs might have been influenced to a maturation of rating effect, becoming less mindful as the rating progressed. Unfortunately, item order was not staggered to control for this possibility. In addition, despite the best efforts of the research team, there were still disciplines that were unable to complete ratings for the project, for example, case managers. Additional limitations are related to the strict adherence to our SME rating procedures. For example, there remain items that the authors would recommend for future editing, as they are not truly “activities.” For example, “being helped,” “being praised by people I admire,” and “being told I am needed.” For these items to become more activity based, the future wording might need to be, “reflect upon the last time I was helped,” or, “reflect upon praise I have received,” or, “think about the last time I was told I was needed.” Finally, generalizability and external validity of items within the DALI to state correctional facilities and county jails will continue to be a limitation. There are over 3,000 U.S. correctional facilities and systems and prisons that operate under similar, but not identical, policies.

In terms of future research, scaling for each item will need to be developed, applied to the item, and then studied. Although each daily activity represents a positive approach to engaging the environment, further refinement through unidirectional Likert-type scales that measure two aspects of each item—frequency of use and enjoyability of the activity—is the next step in future psychometric work. We recommend an anchored 5-point Likert scale that ranges from “not at all” (1) to “very much” (5) for both the frequency and enjoyability ratings. With representative samples of inmates, means for various items on each scale can be examined and informed decisions about item

selection for future versions of the list can be made based on quantitative analysis. Infrequently used, unenjoyable items may then be nominated for further item reduction in service of increased usability. Additionally, because researchers do not yet have enough theoretical or empirical information to hypothesize the number of factors that might underlie the observed items, exploratory factor analysis will need to be conducted. Items with weak loadings might likewise be eliminated.

Each psychometric iteration of the DALI should be applied and explored across a range of inmate groups to aid applicability to different inmate populations. For example, psychometric research with male and female inmates of differing chronological ages, across a range of institution security levels and prison sentences, will all need to be pursued. The anticipated challenge in this regard is the lengthy amount of time that will be required to sample these different inmate groups. Also, for an actual instrument to be effective for use with correctional psychologists, guidance for use will need to be developed and evaluative outcomes established across various diagnostic groups of inmates. This type of applied work can similarly prove both labor intensive and time consuming.

In conclusion, the purpose of this project was to construct a daily activities list for inmates, as the use of this approach has been found effective in community samples. The past 20 years have been watershed decades for the exploration and advancement of CBT, including its application to the corrections environment. This study adds to the existing literature by moving toward the development of another potential tool in what is arguably one of the populations most in need of innovative, efficacious psychological services. Refinement of this measure can only benefit psychological service providers in correctional facilities and the inmates they endeavor to serve.

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Appendix

Final Daily Activities List Organized by In Cell, Either In-or-Out of Cell, and Out of Cell

In cell

Organize your locker
Clean cell
Organize cell
Sleep

Taking a nap
Sleeping soundly at night
Dreaming at night
Doing a chore

Either in-or-out of cell

Take a shower
Journal
Calisthenics
Jumping jacks
Dips
Squats
Push-ups
Calf raises
Play dominos
Play cards
Read a magazine
Read a fiction book
Read a nonfiction book
Eat
Pray
Meditate
Conduct legal research
Draw
Yoga
Talk to another inmate
Build a house of cards
Talk to a staff member
Write your story
Write poetry
Write a letter
Make food
Talk to counsellor
Do a crossword puzzle
Encourage a new inmate
Listen to a radio program
Random act of kindness
Learn an unknown subject
Play tic-tac-toe
Teach someone to play a game
Write a song
Listen to a familiar song
Draw a picture
List how to stay out of SHU (special housing unit)
Daydream about life outside
Tell a joke to cellmate
Learn Spanish
Push-ups to exhaustion
Thinking about myself or my problems
Speaking a foreign language
Making snacks
Being helped
Combing or brushing my hair
Solving a personal problem
Singing to myself
Playing chess or checkers
Taking care of my looks
Having an original idea

Do burpees
Read letters
Vent to cellmate
Talk to officer
Do lats exercise
Sudoku
Learn about new culture
Lunges
Write cop out
Read religious book
Complete rational self analysis
Complete word puzzle
Sit-ups
Draw cards for family/friends
Brush teeth
Make something with paper
Eat commissary
Read GED/college prep book
Write seeking pen pals
Do crunches
Listen to talk radio
Read/plan on calendar
Set/review goals for month
Read about current events
Jog in place
Do oblique exercise
Shave
Do planks
Talking about sports
Reading the scriptures or other sacred works
Reading a "How to Do It" book or article
Reading stories, novels, poems, or plays
Thinking up or arranging songs or music
Saying something clearly
Pleasing my parents
Thinking about something good in the future
Completing a difficult task
Laughing
Solving a problem, puzzle, crossword, etc.
Shaving
Writing stories, novels, plays, or poetry
Having a frank and open discussion
Having someone agree with me
Reminiscing, talking about old times
Getting up early in the morning
Having peace and quiet
Writing in a diary
Being counselled
Being relaxed
Being asked for my help or advice
Thinking about other people's problems
Reading the newspaper

(Appendix continues)

Appendix (continued)

Reading an essay or technical, academic, or professional literature	Cleaning things
Just sitting and thinking	Being with my roommate
Seeing good things happen to my family or friends	Listening to music
Talking about philosophy or religion	Amusing people
Planning or organizing something	Starting a new project
Having a lively talk	Watching people
Listening to the radio	Winning a debate
Getting cards, letters, or notes	Finishing a project or task
Watching the sky, clouds, or a storm	Confessing or apologizing
Wearing clean clothes	Repairing things
Helping someone	Working with others as a team
Hearing jokes	Being with happy people
Talking about my children or grandchildren	Writing letters, cards, or notes
Talking about my health	Talking about politics or public affairs
Eating good meals	Asking for help or advice
Writing papers, essays, articles, reports, memos, etc.	Talking about my hobby or special interest
Doing a job well	Smiling at people
Having spare time	Having people show interest in what I have said
Counselling someone	Having a coffee, tea, a coke, etc. with friends
Having someone give me helpful feedback	Being complimented or told I have done well
Learning to do something new	Being told I am loved
Complimenting or praising someone	Eating snacks
Thinking about people I like	Having family members or friends do something that makes me proud of them
Having daydreams	Thinking about an interesting question
Being alone	Receiving money in my account
Budgeting my time	Making a new friend
Being praised by people I admire	Reading cartoons, comic strips, or comic books
Feeling the presence of the Lord in my life	Teaching someone
Doing a project in my own way	Being coached
Crying	Keeping a diary
Being told I am needed	Chatting with a stranger
Washing my hair	Telling something I have experienced
Coaching someone	Talking about my daily pursuits (job or school, politics, hobbies, public affairs, etc.)
Drinking coffee or tea	Just sitting quietly
Telling someone what I think of him or her	Reading or studying history
Drinking a soda (lemonade, fruit juice, etc.)	Writing or telling stories
Out of cell	
Sprints	Doing artwork (painting, sculpture, drawing, etc.)
Go to class	Breathing clean air
Go to tutor	Having lunch with friends or associates
Go to chapel	Working on my job
Talk to Chaplain	Weighing myself
Get a haircut	Cheering, rooting
Clean day room	Listening to the sounds of nature
Attend counseling group	Playing in a sporting competition
Talk to psychologist	Introducing people who I think would like each other
Attend program	Advancing within my work placement
Listen to a relaxation CD in psychology	Improving my health (having my teeth fixed, getting new glasses, changing my diet, etc.)
Check out self-help book in psychology	Pleasing my work detail supervisor
Attend a bible study group	Talking on the telephone
Talk to Unit Team	Visiting friends
Eat chow	Talking with people on the job or in class
Pull ups in rec	Hearing a good sermon
Do clothing exchange	Winning a competition
Phone call home	Performing a task at work with others
Receive and/or take medication	Performing a task at work alone
Go to visitation	Having a meal with friends
Taking tests when well prepared	Phone friends or acquaintances
Buying things for myself	
