

Advancing the Field of Elder Mistreatment: A New Model for Integration of Social and Medical Services

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Purpose: The purpose of this work is to describe the development and operation of a new model for integration of medical and social services. The Vulnerable Adult Specialist Team (VAST) provides Adult Protective Services (APS) and criminal justice agencies with access to medical experts who examine medical and psychological injuries of victims of elder abuse. **Design and Methods:** This retrospective, descriptive analysis included community-dwelling elders and adults with disabilities who were reported for mistreatment and referred to VAST ($n = 269$). **Results:** Most cases came from APS for mental status and physical examination for evidence of abuse. Cases referred to a medical response team ($n = 269$) were significantly different from cases that were not referred ($n = 9,505$). **Implications:** Ninety-seven percent of those who referred cases to VAST indicated that the team was helpful in confirming abuse, documenting impaired capacity, reviewing medications and medical conditions, facilitating the conservatorship process, persuading the client or family to take action, and supporting the need for law enforcement involvement. As a result, VAST has become institutionalized in our county. Amenable to replication, medical response teams for elder abuse may be useful in other counties across the nation.

Key Words: *Elder mistreatment, Medical, Financial abuse, Neglect, Self-neglect, Demonstration model, Forensic*

Across the nation, law enforcement agencies, district attorney (DA) offices, and Adult Protective Services (APS) report the need for medical input in cases of elder mistreatment (U.S. Department of Justice, 2000). Advanced age and accompanying medical conditions can resemble or mask the indicators of mistreatment (Panel to Review Risk and Prevalence of Elder Abuse and Neglect, 2003). For example, whereas bruises may be a manifestation of physical abuse, they also are a common and innocent physical finding on many older adults. Determining whether injuries or conditions (e.g., bruises, fractures, pressure sores, malnutrition) suggest mistreatment often requires medical expertise to determine whether the observed condition is consistent with the given history.

The physiologic complexity of older adults is compounded by their psychosocial complexity, and thus the complexity of elder mistreatment. As an autonomous person, it is acceptable for an older adult who is cognitively and emotionally intact to choose to live in an unsafe, unkempt environment or give away his or her life savings to a stranger. It may, however, be unacceptable for a demented or psychologically impaired older adult to experience the same circumstance. Determining mental status (both the cognitive and the psychological factors surrounding undue influence) enables an appropriate response in these situations. Given the severe consequences of elder mistreatment, appropriate response can mean the difference between life and death for society's most vulnerable adults (Lachs, Williams, O'Brien, Pillemer, & Charlson, 1996).

Despite guidelines published by the American Medical Association in 1992 (Aravanis et al., 1992), few clinicians receive training in the recognition of elder mistreatment, and fewer still in the medical forensic aspects of elder mistreatment (McCreadie, Bennett, Gilthorpe, Houghton, & Tinker, 2000; Mosqueda, Burnight, & Heath, 2001; Voelker, 2002). The increased

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mortality rate for older adults who have been victims of elder mistreatment underscores the pressing need for an effective response from the medical community (Lachs et al., 1996). Elder mistreatment includes physical abuse, sexual abuse, psychological abuse, financial or material exploitation, neglect, self-neglect, and abandonment. The only national incidence study on elder mistreatment estimated that in a single year (1996), approximately 550,000 adults aged 60 and over experienced some form of mistreatment. They estimated that only one in five cases was reported to APS (Department of Health and Human Services [DHHS], 1998). The authors of this study suggest that this finding may represent only the "tip of the iceberg." The perpetrators of elder abuse are generally individuals on whom older adults depend for care or protection. In cases of self-neglect, mistreatment arises from the need for care coupled with no identified caregiver. More than 90% of perpetrators are family members (DHHS, 1998).

Created in June 2000, with a 3-year grant from the Archstone Foundation, the Vulnerable Adult Specialist Team (VAST) was developed to provide the county's APS, law enforcement, and DA's office with access to trained medical experts who are available to examine the medical and psychological injuries of alleged victims, assess capacity to consent to the situation of concern, document injuries for subsequent legal action, answer medical questions, and testify in legal proceedings. This medical response team was made available at no cost to the referring agency for the duration of the grant period. Orange County, the demonstration site for the project, has a total population of 2,846,289 (U.S. Bureau of the Census, 2000). The services of the VAST medical response team were made available to cases involving the mistreatment or neglect of adults aged 65 and older (9.9% of the county's population) and of adults with disabilities aged 18–64 (10.1% of the county's population). The protocol was approved by the University of California, Irvine, institutional review board.

Design and Methods

The first step in constructing the VAST model was to assemble a medical response team. The team consisted of two geriatricians, a psychologist, a gerontologist, a social worker, and a project coordinator. Each discipline brought specific expertise to the team. The geriatricians on the team were fellowship trained with extensive experience in a variety of health care settings. Given the prevalence of dementia and depression and other mental health issues in the participant population (Dyer, Pavlik, Murphy, & Hyman, 2000; DHHS, 1998), the role of a geropsychiatrist or geropsychologist was thought to be critical to our success. The social worker assisted in the development of intake procedures and helped the team understand the needs of the APS social worker. Our social worker's role was instrumental in the beginning but diminished as VAST established closer ties to the social workers of APS, and this position was phased out after the first year. The gerontologist's roles included establishing a tracking system and designing the study. The coordinator

oversaw logistical aspects of the medical response team and served as a liaison between the referring parties and VAST.

The second step was to integrate VAST into the existing system. Given the complexity of mistreatment, input from community experts (social services, law enforcement, victims' services, the legal community) was critical. In April 1999, before VAST was implemented, we convened the first of a series of meetings that were attended by representatives from APS, law enforcement, DA and public guardian offices, and county mental health, ombudsman, and domestic violence agencies, along with a criminologist and an ethicist. These groups were asked what organizations would benefit from medical input in addressing elder and dependent adult abuse, how such groups could best access such input, which victims would most benefit from a medical evaluation, and what barriers exist to implementing such an approach. There was consensus that the three agencies in the elder abuse network that would most benefit from medical expertise were APS, law enforcement, and the DA's office. The participants encouraged the team to provide easy access to referring parties and to ensure an efficient response. They strongly recommended we perform house calls, given the transportation difficulties of the population and the important information that is ascertained only through a home visit. The agencies also highlighted the need for the team to assist in the evaluation and documentation of abuse cases involving adults with disabilities.

After creation of the team, the next step was to create a practical and replicable system for implementing it. Members of VAST met with the referring agencies to explain the services provided by a medical response team, and a dedicated phone line and e-mail address were established.

In the early stages, the team social worker took cases by phone or e-mail and presented them at the weekly VAST meeting at the university medical center. The team discussed each case and formulated recommendations for further action, such as evaluation for evidence of physical or financial abuse, capacity evaluation, medical record review, answering a medical question, and/or reviewing a photo, record, or videotape. The VAST coordinator took the recommendation back to the referring party. Once the action or actions were complete, reports of the findings and a conclusion as to the likelihood and type of abuse were generated by the VAST team and submitted to the referring party.

After several months, when it became clear that the majority of cases (89%) were from APS, the team moved the weekly meeting from the university to APS headquarters to enable the referring parties to present their cases directly to the team. This critical change allowed a direct dialogue between the medical team and the referring party. APS workers who were not involved in the case were invited to attend. The ensuing discussions were educational and served to inform subsequent cases. Physical and attitudinal barriers that had previously prevented helpful interactions between APS workers and the medical team were broken. Sitting together and discussing cases provided each group with

an expanded understanding of the issues. The meetings were also an administrative success, as appointments for evaluations could be arranged immediately. Given the direct connection of the team to APS social workers, the functions of the VAST social worker were no longer required. Intake and follow-up systems also were affected by the change. APS suggested that intake forms would be more useful if they were electronic, could be accessed from APS's shared drive, and e-mailed to the VAST. Together with APS, the medical team developed a standardized electronic form with drop-down menus and options with check boxes. Similarly, the follow-up system was implemented so that case outcomes and evaluations of the effectiveness of the VAST could be conducted through electronic forms and e-mailed to referring parties and then back to the VAST for entry in the database.

Results

In the first year of the project, VAST received 98 referrals, and in the second year, it received 171 referrals. The majority of the 269 referrals in the first 2 years were from APS (89%), with law enforcement referring 4% of the cases, the DA's office referring 3% of the cases, and 4% coming from other sources.

Table 1 summarizes the frequency and types of requests that were made to the medical response team. Requests for in-person evaluation accounted for 78% of the referrals to VAST. The most common request was for mental status evaluation (35%). A medical evaluation was requested in 22% of referrals, and the referring party requested both a mental status and a medical evaluation in 21% of the referrals.

Requests for medical information or referrals accounted for 10% of the cases, and 5% of the requests were for reviews of records or photos. In 6% of the cases, the referring party did not know what medical input was necessary but prefaced such requests with, "Help! I have this case. . . ." The VAST geriatricians often served as liaisons between APS and the medical community. These calls included contacting the primary care physicians for additional information, especially when the APS worker could not get through. This also included educating the primary physician about elder abuse, specifically about mandated reporting and warning signs and definitions of abuse and neglect.

Between April 2000 and April 2002, there were 9,505 reports made to the county's APS. Table 2 summarizes the demographic characteristics of cases referred to VAST ($n = 269$) as compared with all APS reports during the first 2 years of the project. Of the 9,505 reports made to APS, 63% of the cases involved female victims, and in 74% of the cases, the victim was an older adult. Seventy-six percent (76%) of the victims were White, 10% were Hispanic, 4% were Asian, and 1% were African American. The gender distribution was similar between the VAST cases and the overall APS case sample, but there was a significant difference in the proportion of cases involving dependent adults. Dependent adults accounted for 26% of the overall APS reports but only 17% of VAST referrals. Cases

Table 1. Requests for Medical Input

Request	Frequency	%
Mental status evaluation	94	35
Medical evaluation	60	22
Mental status and medical evaluation	56	21
Medical information or referral	27	10
Review records/photos	14	5
Vague or "help!"	17	6
Total	269	100

involving Hispanic victims accounted for 10% of the APS overall case reports but 4% of the VAST referrals.

In the 9,505 reports, there were 12,308 allegations of abuse because many reports contained allegations of multiple types of abuse. In the cases referred to VAST, the most common type was self-neglect (35%), followed by emotional abuse (19%), neglect (17%), financial abuse (16%), physical abuse (10%), and sexual abuse (2%). There was a significantly greater proportion of financial abuse reported to the medical response team (29% vs. 16%) and a significantly smaller proportion of emotional abuse cases (6% vs. 19%). In all other abuse types, there were no significant differences in frequency.

Of the 269 cases referred to VAST, 7% of the cases referred were not appropriate for the services offered by VAST (Table 3), for example, a request for medical care that did not relate to abuse or neglect. In 54% of the cases referred, a home visit was conducted. In potentially violent situations or a situation in which the suspected perpetrator would not allow access to the victim, visits were made jointly with law enforcement support. For 51 referrals (19%), VAST clinicians answered medical questions and provided input during the case review, but the cases did not require an in-home medical assessment.

After a case was closed, the VAST coordinator sent the referring party a five-item follow-up survey: (a) Was VAST helpful? (b) If it was helpful, how was it helpful? (c) What was the disposition of the case? (d) How can VAST improve? (e) Do you have any additional comments? Of the first 269 cases referred to the VAST, 220 were appropriate for the follow-up survey. Forty-nine were not appropriate for the following reasons: Participant canceled the appointment, participant refused consent, or case was not an appropriate VAST referral. Of the 220 cases appropriate for follow-up, 156 follow-up forms were returned for a response rate of 71%. To the question "Was VAST helpful?" 152 respondents (97%) indicated "yes" and 4 (3%) indicated "no" (Table 4). The responses to the open-ended question querying how VAST was helpful grouped into 11 themes, with the 3 most common being confirmed abuse (33%), documented impaired capacity (33%), and reviewed medications and/or clarified a medical problem (22%). As respondents indicated multiple areas of assistance on a given case, the responses add up to >100%. Responses to the question regarding the disposition of the case grouped into eight categories, with many respondents indicating more than

Table 2. Demographics and Abuse Type

Demographic	All APS Reports (N = 9,505)		VAST Referrals (N = 269)		p Value from χ^2
	Frequency	%	Frequency	%	
Female	6,017	63	178	66	.65
Male	3,213	34	90	33	.93
Not identified	275	3	0	0	N/A
Older adult	7,024	74	215	80	.40
Dependent adult	2,481	26	47	17	.01*
Not identified	0	0	7	3	N/A
White	7,270	76	205	76	.96
Asian	345	4	6	2	.24
Hispanic	911	10	11	4	.005**
African American	138	1	5	2	.60
Other	87	1	4	1	.34
Unknown	754	8	38	14	N/A
Self-neglect	4,363	35	98	28	.06
Emotional	2,269	19	20	6	.0001***
Neglect	2,088	17	73	21	.08
Financial	1,999	16	101	29	.0001***
Physical	1,222	10	37	11	.65
Sexual	186	2	9	3	.11
Abandonment	147	1	4	1	.96
Abduction	34	.2	2	.5	.30
Total	12,308 allegations in 9,505 APS reports	Mean of 1.29/victim	344 allegations in 269 VAST referrals	Mean of 1.27/victim	

Notes: APS = adult protective services; VAST = vulnerable adult specialist team.
* $p < .05$, ** $p < .01$, *** $p < .001$.

one outcome. The most common outcomes included care plan established (48%), conservatorship process initiated (29%), refusal of suggested services (15%), hospitalization of victim (12%), and victim remained safely at home (12%). Seven respondents offered recommendations for improving VAST by encouraging more interaction between VAST and the public guardian and mental health services, changing report formats, streamlining the follow-up form, and scheduling home visits more quickly.

Discussion

VAST was developed to provide APS, law enforcement, and the DA's office with access to trained medical

experts. Preliminary results are encouraging: Ninety-seven percent of those who referred cases indicated that the team was helpful. Specifically, VAST was found to be helpful in confirming the absence or presence of abuse, documenting impaired capacity, clarifying a medical problem, facilitating the conservatorship process, persuading client or family to take action, and supporting the need for law enforcement involvement.

The higher percentage of financial abuse cases referred to VAST may be due to that fact they are often more complex and extend beyond the scope of training for most APS or law enforcement personnel (Tueth, 2000). Assessment often comes down to the victim's vulnerability, and this usually translates into a determination of cognitive function and capacity. VAST receives fewer dependent adult referrals and fewer cases of emotional abuse than generally referred to APS. This may reflect the fact that VAST is focused on medical issues. This difference also may represent a relative comfort of the APS social workers in dealing with younger clients and with emotional issues or a perception that VAST may not be useful in these types of cases. The significant difference in the referral of Hispanic victims may be due to the absence of any VAST member who speaks Spanish; based on this finding, the team has incorporated a geriatrician who is fluent in Spanish.

Although the majority of referrals come from APS, medical consultations for cases referred by law enforcement and the DA are equally important. During the initial phase of this project, the dominance in

Table 3. Action Taken on Referrals

Action	No. of Participants	%
Total number of referrals	269	100
Home visit completed	144	54
Medical input in case review (w/o home visit)	51	19
Record/photo review	11	6
Talked to a client's physician	14	5
Inappropriate referral	26	7
Visit scheduled but appointment cancelled	16	6
Participant refused consent	7	3

referrals from APS was appropriate because our initial outreach effort was focused on APS. Current and future efforts are planned to reach out to law enforcement and the DA. This collaboration also will assist the physicians and psychologist in improving their forensic skills and expertise.

The majority of requests were for mental status evaluation, especially for capacity determination. This determination is often key to the investigation of abuse (Coyne, Reichman, & Berbig, 1993). Unlike child abuse, elders and dependent adults are presumed competent until proved otherwise. They thus have the right of autonomy even if that choice leads to abuse or neglect. If, however, they lack capacity, the family and ultimately society have the right and the responsibility to step in and protect them (Older Americans Act, 1992). Reasons why people lack capacity extend beyond the presence or absence of dementia and may include common conditions in the elderly such as depression, grief, or delirium (DHHS, 1998). This evaluation also helps to establish the type, severity, and reversibility of the mental status impairment, especially in cases of delirium or "pseudodementias." These mental status evaluations are often the trigger for conservatorship applications or appropriate placement or support groups. Members of VAST may intervene with the family or primary care physician in order to help the situation. Many of the referrals from law enforcement or the DA are for a review of records or photos or for medical information. In these cases, the victim may already be deceased. These forensic cases pose additional clinical challenges such as differentiating innocent causes of trauma from those inflicted, knowing how to document and collect evidence in suspected cases of mistreatment, and serving as an expert witness in court (Kane & Goodwin, 1991; Langlois & Gresham, 1991; Marshall, Benton, & Brazier, 2000).

Ethical issues also arose during this project. Concerns were raised about obtaining consent from people who were suspected of being cognitively impaired or otherwise vulnerable to undue influence. This issue was discussed with our advisory board, which included a gerontologist, and with our institutional review board human subjects committee. In questionable situations and where possible, consent was obtained both from the participant and from the legal representative. Our visits were made with the APS social workers who witnessed the consenting process and who helped ensure the absence of coercion. We were surprised at the few numbers of potential participants who refused consent (3%). Refusals included family members and caregivers who served as the legal representatives who were actually the suspected perpetrators of the abuse or neglect.

Conclusion

This project showed that a medical response team may be successfully integrated into the existing elder mistreatment system of a large county. Physicians and psychologists with expertise in geriatrics needed to be educated about elder mistreatment and willing to learn

Table 4. Follow-Up Survey of Referring Parties (n = 156)

Survey	%
Was VAST helpful?	
Yes	97
No	3
If it was helpful, how was it helpful?	
Confirmed a form of abuse, neglect, or self neglect	33
Documented impaired capacity	33
Reviewed medications and/or clarified a medical problem	22
Facilitated conservatorship process	21
MD persuaded client/family to take action that APS/others recommended	17
Assisted with referral for medical care	14
Reviewed file or video	13
Contacted client's physician	9
Supported the need for law enforcement involvement	8
Confirmed absence of abuse	6
Helped get victim hospitalized	5
Disposition of case	
APS plan established	48
Case referred for conservatorship	29
Victim refused services	15
Victim hospitalized/psych admission	12
Victim safely at home	12
Case referred to law enforcement and/or DA	11
Victim died	6
Victim placed (SNF, B & C, AL)	5

Notes: VAST = vulnerable adult specialist team; APS = adult protective services; DA = district attorney; SNF = skilled nursing facility; B & C = board and care; AL = assisted living.

"on the job." A relationship with APS was cultivated before a working partnership was formed. All parties were able to listen, argue, maintain openness to new ideas, and deal with the uncertainty that accompanies a new project.

Our geriatricians dedicate a combined 30% of their time to VAST, as does our psychologist. Therefore, the cost of such a model is the reimbursement for the part-time medical experts. Their time is primarily devoted to team meetings, consultations, and report preparation. In our case, VAST is coordinated by a master's-level gerontologist, but an APS employee assigned to the task could also facilitate the project. This county's APS agency has institutionalized the VAST model by funding it through tobacco settlement funds. Amenable to replication, medical response teams for elder abuse may be useful in other counties across the nation.

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