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## Abstract

Dissociative experiences are common among children and adults, ranging from normative to pathological frequency and severity. This chapter details important aspects of dissociation following traumatic experiences, including empirical

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support for the trauma model of dissociation, psychobiological processes involved in dissociative experiences, and the presence of both dissociative symptomatology and dissociative disorders in patients diagnosed with post-traumatic stress disorder. Additionally, the authors discuss the complexities of conducting trauma treatment with dissociative individuals, including differential diagnosis and treatment approaches grounded in current treatment outcome research. Finally, key points to further inform readers about assessment and treatment of dissociative disorders are included at the conclusion of the chapter.

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### List of Abbreviations

ACES	Adverse Childhood Experiences Study
BPD	Borderline personality disorder
CSA	Childhood sexual abuse
DD	Dissociative disorders
DDNOS	Dissociative disorder not otherwise specified
DID	Dissociative identity disorder
DPTSD	Dissociative subtype of PTSD
DSM-5	<i>Diagnostic and statistical manual of mental disorders, fifth edition</i>
NIS	Neutral identity states
PTSD	Post-traumatic stress disorder
SIB	Self-injurious behavior
TIS	Trauma identity states
TOP DD	Treatment Outcome of Patients with Dissociative Disorders Study

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## Introduction

Dissociation is “a disruption and/or discontinuity in the normal integration of consciousness, memory, identity, emotion, perception, body representation, motor control, and behavior” (American Psychiatric Association [APA] 2013, p. 291). Dissociative experiences are common in both children and adults, ranging from mild detachment from current surroundings to severe detachment and identity fragmentations seen in dissociative identity disorder (DID). During overwhelming, and often traumatic, experiences, dissociation allows for psychological protection through detachment when fight/flight is impossible (Silberg and Dallum 2009) and can involve absorption, amnesia, identity alteration, depersonalization (i.e., feeling detached from one’s body or emotions), and derealization (i.e., feeling as if the world is not real).

Research addresses many dissociation-related variables, six of which are the focus of this chapter: (1) the relationship between trauma exposure and dissociation, (2) the psychobiology of dissociation, (3) the manifestation of dissociative symptoms in patients diagnosed with post-traumatic stress disorder (PTSD), (4) the comorbidity of PTSD and DD, (5) the impact of dissociation on empirically supported treatments for PTSD, and (6) the treatment of DD.

## Trauma and Dissociation

Research supports the connection between dissociation and a range of traumatic experiences in diverse socioeconomic, geographic, and patient populations (Kucukgoncu et al. 2014; Stein et al. 2013). Despite growing literature supporting the trauma model of dissociation, the debate between trauma and fantasy model theorists is ongoing (Dalenberg et al. 2014; Lynn et al. 2014). The *trauma model* of dissociation (TM) posits that dissociation is a psychobiological response that enhances individuals' survival during and after a traumatic event. According to this model, dissociation allows individuals to automatize behavior, experience analgesia, separate mental experiences from physical ones, and compartmentalize devastating experiences (Bremner and Marmer 1998; Spiegel 1984). This model has been challenged by a few authors who support the *fantasy model* of dissociation (FM), which argues that the relationship between reported trauma and dissociation is due to fantasy proneness, suggestibility, and cognitive failures (e.g., Giesbrecht et al. 2008). They contend that dissociation is a psychological process that is not causally related to trauma. A review of nearly 1,500 articles systematically investigated empirical support for both models (Dalenberg et al. 2012); the authors concluded that the evidence overwhelmingly indicates that trauma causes dissociation. A meta-analysis showed a moderate effect size for the trauma–dissociation relationship in samples with childhood sexual abuse (CSA;  $r = .31$ ) and physical abuse ( $r = .27$ ). The effect size of the trauma–dissociation relationship was even stronger among individuals with DD, .54 for CSA and .52 for physical abuse. The correlations between trauma and dissociation were *as strong* in studies that used objectively verified abuse as in those relying on self-reported abuse, contradicting the FM idea that dissociative individuals fantasize abuse histories. Dissociation predicted only 1–3 % of the variance in suggestibility, disproving the FM's notion that dissociative individuals are highly suggestible. In summary, almost all research supports the TM and shows that antecedent trauma causes dissociation (see Table 1).

## Complex Trauma

Chronic traumatization is associated with higher rates of dissociation than single-incident traumatization (Putnam 1997; Zoroglu et al. 2003) and is associated with a wider range of clinical problems than DSM PTSD (Putnam et al. 2013). Even when socioeconomic status and ethnicity are controlled, higher cumulative trauma in childhood is associated with greater symptom complexity, both in children and adults (Cloitre et al. 2009). The construct *complex trauma* refers to repeated exposure to emotional and/or bodily harm by important adults during developmental years. The long-lasting effects typically include problems with affect regulation, impulse control, dissociation, somatization, self-perception, beliefs about oneself, others and the world, and interpersonal relationships (Courtois and Ford 2009; Herman 1992). Individuals with complex trauma demonstrate higher dissociation

**Table 1** Summary of findings from Dalenberg et al. (2012)

Variable	Fantasy model prediction	Trauma model prediction	Findings based on literature review
1 Is there consistent evidence for the trauma-dissociation connection?	Dissociation overlaps with fantasy proneness, suggestibility, and cognitive distortion, which increase the reporting of trauma	Dissociation will be higher in recently traumatized individuals and individuals who have experienced chronic and/or severe abuse	<ul style="list-style-type: none"> <li>• Research strongly supports TM</li> <li>• Consistent relationship found between trauma and dissociation</li> <li>• Moderate effect sizes in studies utilizing large, diverse community and clinical samples</li> <li>• Probability of a trauma history in DD samples was significantly higher than in psychiatric controls</li> </ul>
2 Does the trauma-dissociation relationship disappear in studies with “objective” measures of trauma?	Dissociative individuals are prone to constructing fantasies of abuse which are then mistaken by the individuals as actual trauma memories	Dissociation is related to objective trauma. Self-reports of trauma are primarily accurate	<ul style="list-style-type: none"> <li>• Research strongly supports TM</li> <li>• The relationship between trauma and dissociation was as strong in studies with objectively verified trauma as in studies relying on self-reported trauma</li> </ul>
3 Does level of dissociation change with time and after trauma treatment?	There will not be a relationship between dissociative symptoms and trauma treatment	Dissociation will increase after trauma and decrease spontaneously over time for most individuals. Trauma treatment will assist with the decrease in dissociation	<ul style="list-style-type: none"> <li>• Research strongly supports TM</li> <li>• Dissociation was chronologically related to trauma and trauma treatment</li> <li>• Studies found that dissociative symptoms were highest following exposure to trauma, and for most individuals, they declined over time; dissociative symptoms reduced during trauma treatment</li> <li>• Dissociative symptoms did not decrease in the control and placebo samples included</li> </ul>

4	Does dissociation show an increment over fantasy proneness in the prediction of trauma?	Fantasy proneness will predict trauma report and dissociation will not	Trauma will be more predictive of dissociation than fantasy proneness	<ul style="list-style-type: none"> <li>• Research strongly supports TM</li> <li>• Trauma history was more predictive of dissociation than fantasy proneness</li> <li>• The trauma-dissociation relationship was maintained after controlling for fantasy proneness</li> </ul>
5	Are dissociative individuals at high risk for suggestibility and false memory?	Dissociative individuals will be more suggestive than nondissociative individuals	Fantasy proneness will characterize only some dissociative individuals and will be related to false memory. Dissociation will not be related to false memories	<ul style="list-style-type: none"> <li>• Research strongly supports TM</li> <li>• Dissociation accounted for a mere 1-3 % of suggestibility in the studies using a wide range of methodology to examine it</li> <li>• Those with delayed recall of trauma were actually <i>less</i> suggestible than other psychiatric patients</li> </ul>
6	Is dissociation related to fragmentation, omission, and narrative cohesion in the recollections of traumatic memories?	There will be no relationship between dissociation and fragmentation	Dissociation will be related to the nature of traumatic memories, including increased fragmentation and decreased cohesion	<ul style="list-style-type: none"> <li>• Extant research supports TM but more research is needed</li> <li>• Studies indicated a positive correlation between dissociation and objective fragmentation of memory</li> <li>• One study found a higher rate of fragmentation in severely abused children than children alleging single episode abuse from a nonattachment figure</li> <li>• Along with trauma symptoms, fragmentation also improved over time with treatment</li> </ul>
7	Is the recovered memory phenomenon a product of dissociation or fantasy?	Those who claim to be recalling a memory are not likely to be recalling an actual trauma	Dissociative individuals will be more likely to have difficulty remembering important aspects of the trauma memory	<ul style="list-style-type: none"> <li>• Research strongly supports TM</li> <li>• Amnesic phenomena were related to dissociation in a variety of ways</li> <li>• Recovered memories were largely accurate</li> <li>• The difference between individuals</li> </ul>

(continued)

**Table 1** (continued)

Variable	Fantasy model prediction	Trauma model prediction	Findings based on literature review
<p>8 Can biological studies inform the TM vs FM debate?</p>	<p>An individual's belief that he/she has experienced trauma will be enough to affect objective psychophysiological responses to trauma-related stimuli</p>	<p>The biology of dissociation will ultimately fit with theories about the biological regulation and the brain's response to fear and other extreme emotions</p>	<p>with recovered memory and those who had continuous memory of trauma may be able to suppress thoughts</p> <ul style="list-style-type: none"> <li>• There was no evidence that 'retractors' (i.e., individuals who later stated that their trauma memory was false) were more likely to be dissociative</li> <li>• Patient reported dissociative symptoms were corroborated by objective family or psychiatric observations and ratings</li> <li>• Research not yet conducted that directly addresses the TM vs. FM debate, but thus far                             <ul style="list-style-type: none"> <li>• Genetic factors alone are not sufficient to explain dissociative symptoms. It is likely that an interplay between genetic and environmental (i.e., trauma exposure) factors accounts for variability in dissociative symptoms</li> <li>• Research has demonstrated similarities between dissociative individuals and animals who are confronted with an inescapable threat (i.e., tonic immobility)</li> </ul> </li> </ul>

scores than those with DSM PTSD and may be diagnosed with DD as well as PTSD (Dorahy et al. 2013; Zucker et al. 2006). Within complex trauma samples, dissociation is associated with fear of relationships and withdrawal from situations which might evoke shame (Dorahy et al. 2013).

## Dissociative Disorders and PTSD

While trauma often causes dissociation, the trauma model does not propose that trauma *invariably* leads to dissociation (Dalenberg et al. 2014, p. 912). Nevertheless, trauma or overwhelming stress precedes the development of most cases of dissociative amnesia (DA), many cases of “other specified dissociative disorder” (previously referred to as dissociative disorder not otherwise specified or DDNOS), and almost all cases of DID (Simeon and Loewenstein 2009).

A review cited prevalence rates of DD ranging between 1.7 % and 18.3 % in community samples, 12–29 % of outpatients, 4.3–40.8 % of inpatients, and 34.9 % of emergency department patients (Sar 2011). In these same studies, DID was found in 0.4–3.1 % of community samples, 2–6 % of outpatients, 0.4–7.5 % of inpatients, and 14 % of those presenting to emergency departments.

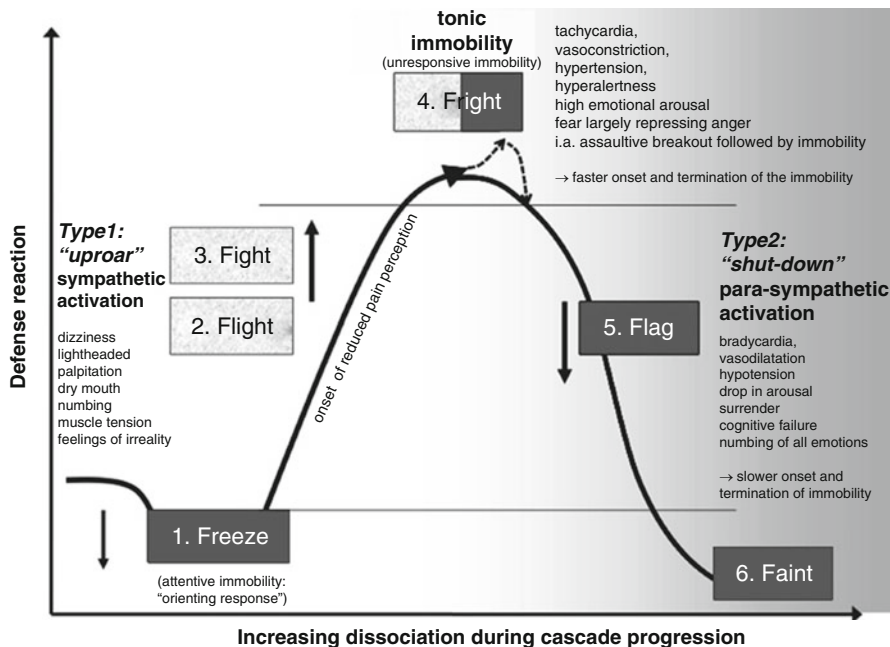
DA involves an inability to recall important autobiographical information, typically of a traumatic or stressful nature, that goes beyond everyday forgetfulness (APA 2013). This disorder may present dramatically as sudden, significant amnesia or more subtly. Research suggests that a subset of CSA survivors experience DA (see Wolf and Nochajski 2013), and in the Adverse Childhood Experiences Study, rates of impaired autobiographical memory were higher among incest survivors than those who experienced nonincestuous CSA, as well as among those with repeated or more severe abuse (Edwards et al. 2001). CSA survivors with DA experience greater PTSD symptoms than those with continuous memory (e.g., Butler 2001; Elliott and Briere 1995).

DID is the most severe of the DD disorders. The majority of patients with DID and DDNOS have comorbid diagnoses of PTSD (80–98 %) (Ellason et al. 1996; Rodewald et al. 2011). In contrast to media portrayals, DID patients do not often present with dramatically obvious self-states. Rather, they demonstrate dissociative, emotionally dysregulated, and post-traumatic symptomatology, as well as amnesia for some behaviors (International Society for the Study of Trauma and Dissociation [ISSTD], 2011).

For patients with high dissociative symptomatology or DD, repeated self-injurious behavior (SIB), chronic suicidal ideation, and multiple suicide attempts are common. The majority of DID patients experience suicidal ideation, and suicide attempts range from 60 % to 80 %. SIB rates are as high as 40–77 % (e.g., Boon and Draijer 1993; Foote 2013; Putnam et al. 1986). Dissociation is the strongest predictor of repeated suicide attempts and SIB within traumatized populations, including those with PTSD (e.g., Foote et al. 2008; Yargıç et al. 1998). In a longitudinal DD treatment outcome study, depression predicted clinician-reported SIB; however, dissociation predicted both clinician-reported suicidality *and* SIB (Webermann et al. [submitted](#)).

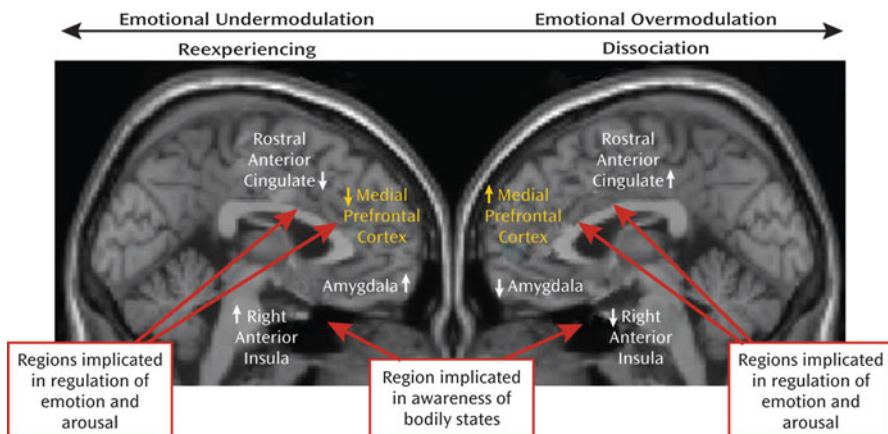
## Psychobiology of Dissociation

The “fight or flight” response to trauma has been extended to include *freeze – flight – fight – fright – flag – faint* responses (Nijenhuis et al. 1998; Schauer and Elbert 2010). This cascade explains dissociative responses are due to neurobiological adaptations to increasing levels of life threat. When an animal cannot flee from a dangerous situation or fight against a predator, it may develop immobility, which can increase the odds of survival if the predator loses interest, resulting in an opportunity for escape. When confronted with danger, the nature and proximity of the threat, previous experiences, and the likelihood of prevailing over the danger influence whether animals respond with active defense mechanisms and/or immobility. Schauer and Elbert’s (2010) model illustrates this process; after initially experiencing a momentary decrease in heart rate and inhibited startle response while scanning for danger (freeze), the animal actively responds by attempting to flee or fight. If fleeing is not possible, the animal may enter the fright stage, also known as *tonic immobility*, a peak of arousal and physical immobility where the sympathetic and parasympathetic nervous systems are simultaneously activated to decrease hyperarousal, and finally *shuts down*, wherein it may enter a profoundly dissociative state (flag) or even faint as a response to the overwhelming life threat (Fig. 1).



**Fig. 1** The freeze-flight-fight-fright-flag-faint defense cascade (Reproduced with permission from *Zeitschrift fuer Psychologie/Journal of Psychology*, Vol. 218(2):109–127, ©2010 Hogrefe Publishing [www.hogrefe.com](http://www.hogrefe.com) DOI: 10.1027/0044-3409/a000018)





**Fig. 2** Emotional under- and overmodulation in PTSD (Reprinted with permission from the American Journal of Psychiatry, (Copyright ©2010). American Psychiatric Association)

*Dissociative PTSD subtype.* Bremner (1999) hypothesized that survivors may demonstrate two subtypes of acute trauma response, one predominantly hyperaroused/intrusive (i.e., classic PTSD; not predominantly dissociative) and one predominantly hypoaroused, often associated with experiencing state dissociation. In studies that exposed traumatized individuals to trauma scripts, 70 % reexperienced their trauma with hyperarousal, while 30 % had a dissociative, hypoaroused response (Lanius et al. 2006). Stein et al. (2013) found dissociative symptoms among 14.4 % of those with PTSD among 25,018 respondents from 16 countries. This subtype is the dissociative subtype of PTSD (DPTSD); DPTSD is associated with early, chronic, and repeated traumatization (Lanius et al. 2010; Stein et al. 2013). In neuroimaging studies, individuals with DPTSD respond to trauma scripts with prefrontal inhibition of limbic regions, including the amygdala, which allows for disengagement from the emotional content of the memory through depersonalization and derealization, as well as decreased heart rate, blood pressure, and related biomarkers (Lanius et al. 2010, 2014). This contrasts with the hyperarousal pattern shown in DSM PTSD characterized by reduced prefrontal activity and limbic overactivity and physiological activation including increased blood pressure and heart rate (Fig. 2). A review found evidence that psychotherapy, but not pharmacotherapy, may be associated with reduction of these abnormal activation patterns, including among individuals with complex trauma who showed activation patterns consistent with DPTSD (Thomaes et al. 2014).

*The Psychobiology of Dissociative disorders.* DID is considered a post-traumatic developmental disorder involving “inconsistencies in identity, memory, and consciousness” (Spiegel et al. 2013, p. 301) and is characterized by the presence of two or more distinct self-states within an individual (APA 2013). Putnam (1997) theorizes that children dissociate to escape emotional and physical pain that is experienced during trauma, particularly if it is repeated. The frequent utilization of this

coping mechanism results in alterations in memory storage and encoding, which in turn leads to fragmentation of memory. Discrete self-states based on fragmented memory and related behavioral, cognitive, interpersonal, and neurobiological patterns develop over time. The theory of structural dissociation (Nijenhuis and Den Boer 2009; Van der Hart et al. 2006) proposes the development of two types of self-states in DID, including *apparently normal parts* and *emotional parts*. Apparently normal parts, also referred to as *neutral identity states* (NIS), assist DID patients in achieving daily functioning while avoiding trauma-related memories and experience numbness and/or amnesia about trauma. Emotional parts, or *trauma identity states* (TIS), are theorized to identify with trauma memories and related intense emotion and typically struggle with reexperiencing and reenactment of trauma.

Research has identified neurobiological differences between NIS and TIS (Reinders et al. 2006, 2014). For example, when DID patients listened to neutral and traumatic autobiographical scripts in NIS and TIS states (Reinders et al. 2006), NIS perfusion patterns (i.e., patterns of brain blood flow) resembled those of patients with depersonalization disorder and DPTSD. In the TIS, patients' perfusion patterns showed activation consistent with hyperaroused PTSD symptoms (e.g., increased heart rate and blood pressure, decreased heart rate variability). Another study examined NIS and TIS brain perfusion patterns when DID patients were instructed to rest (Schlumpf et al. 2014). Resting NIS perfusion showed no thalamic activation, again parallel to findings regarding the DPTSD. In TIS, patients showed activation in the somatosensory cortex, a part of the brain active in responding to bodily sensations, and they became highly aware of bodily sensations. These findings correspond with expectations that TIS would experience alarm when given instructions to relax, close their eyes, and remain still. Collectively, current neurobiological research suggests there are theoretically consistent underlying biological correlates of dissociation.

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## Clinical Practice and Treatment

### Dissociation in PTSD Treatment

Lanius and colleagues (2010) strongly advocate for clinicians to assess dissociative symptoms prior to engaging patients in any exposure-based treatments, stating that "failure to do so can lead to an actual increase in PTSD and related symptoms" (p. 644). Their emphasis on proper assessment stems from recent studies' findings that dissociation often *does* make a difference in outcome for treatment, a fact that has often resulted in dissociation being used as exclusionary criteria for PTSD outcome studies. Patients with DD are almost always excluded from treatment outcome research, even studies of chronic childhood abuse (e.g., Cloitre et al. 2002). In a study where exclusionary criteria made it unlikely that patients with DD were enrolled (Hagenaars et al. 2010), 69 % of participants with moderate levels of dissociation continued to meet criteria for PTSD after receiving exposure therapy, as compared to only 10 % of low dissociators. Dissociation inhibits

amygdala-based emotional learning in borderline patients (Ebner-Priemer et al. 2009) and may interfere with treatment, particularly when it occurs *during* treatment sessions (Brand and Lanius *in press*).

However, not all studies find different or worse outcomes with patients with moderate levels of dissociation. Some research suggests that elements of PTSD treatment may treat dissociative symptoms without directly targeting them (see Resick et al. 2012 for review). Cloitre and colleagues (2002) developed a two-phase treatment for complex PTSD that included skills training followed by modified prolonged exposure. Their results suggested that focusing on emotion regulation and interpersonal effectiveness assisted with stabilization and prepared patients for trauma processing. Dorrepaal and colleagues (2013) concluded that adding a stabilization component to cognitive behavioral treatment was effective for complex PTSD. The approach taken by Cloitre et al. and Dorrepaal et al. may have been beneficial because treatment was consistent with expert recommendations for a stage-based approach to DD and complex trauma treatment, discussed below.

Some research stresses the importance of focusing on dissociative symptoms in DD treatment. One study examined treatment outcome of patients admitted to a specialized trauma inpatient program (Jepsen et al. 2014). Patients with CSA but no DD were compared to patients with CSA and DD. Trauma treatment that did not specifically address DD symptoms (such as amnesia and identity fragmentation) resulted in lower rates of reliable overall improvement for DD patients. The authors concluded that directly addressing DD symptoms is necessary. Evaluation of a specialized program for DD patients is underway (E. Jepsen, personal communication, June 2013).

## Assessment for Dissociation and Dissociative Disorders

Assessment for dissociation is crucial because high dissociation may be associated with a different response to treatment. An office mental status examination that inquires about trauma exposure and dissociative symptomatology is available (Loewenstein 1991), along with validated, self-report measures (see Table 2) and structured interviews. Information regarding the assessment of dissociation and DD in adults is available (see ISSTD 2011; Brand and Loewenstein 2010).

Clinicians must distinguish between DD and disorders whose symptoms may look similar and co-occur with DD. DD patients typically have higher dissociative symptoms, more severe trauma histories, and greater hypnotizability than those with borderline personality disorder (BPD), schizophrenia, or bipolar disorder (Brand et al. 2009; Putnam et al. 1996; Simeon and Loewenstein 2009). Symptom presentations are also different. For example, those with DD typically use self-harming behaviors to induce dissociation rather than end it, in contrast to BPD. Rapid changes in affect are easily triggered, as compared to those with bipolar disorder, where changes occur more slowly, and schizophrenia, where affect is flat or inappropriate. Emptiness, a hallmark symptom of BPD, is less typical in DID. Finally, compared to

**Table 2** Self-report measures of dissociation

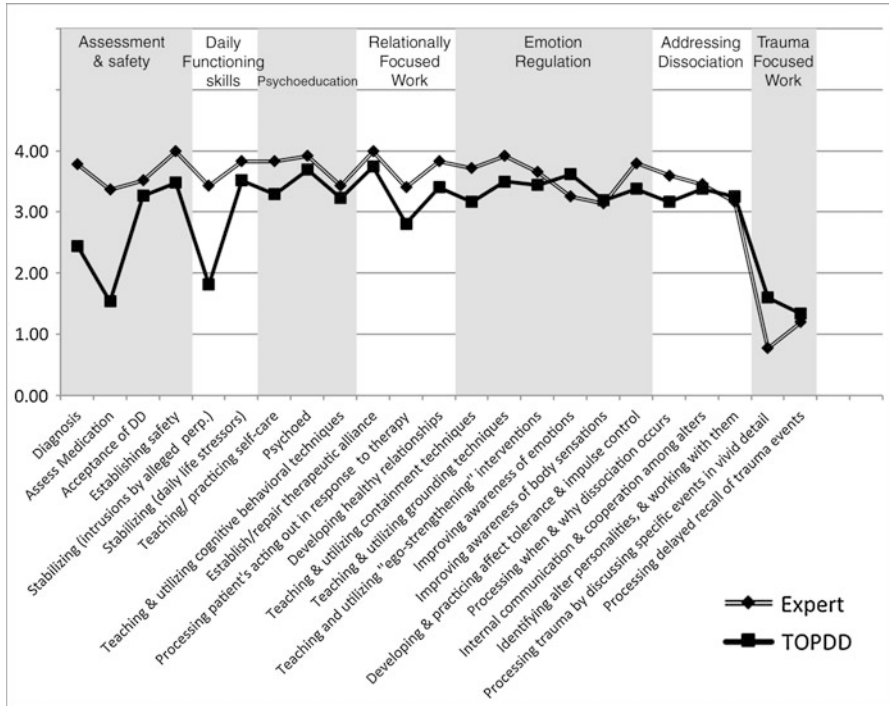
Scale	Citation	Items	Symptoms assessed
Dissociative Experiences Scale (DES)	Bernstein and Putnam (1986)	28	Amnesia, absorption, identity alteration, depersonalization, derealization
Multidimensional Inventory of Dissociation (MID)	Dell (2006)	218	Wide range of dissociative symptoms including derealization, depersonalization, amnesia, and intrusions from dissociated self-states; includes validity, PTSD, and characterological scales
Multiscale Dissociation Inventory (MDI)	Briere et al. (2005)	30	Dissociative symptoms including derealization, depersonalization, amnesia, identity confusion, numbing
Somatoform Dissociation Questionnaire (SDQ)	Nijenhuis et al. (1996)	20	Physical symptoms (i.e., somatoform) of dissociation

schizophrenia, DD patients recognize that voices they hear are not heard by others; their voices often sound like abusers or hurt children (Brand and Loewenstein 2010).

## Treatment of Severe Dissociative Disorders

The complex trauma/DD literature recommends a trauma-informed, staged approach to treatment (ISSTD 2011; Herman 1992; Klufft 1993a). The first stage focuses on psychoeducation, enhancing control over symptoms through the development of affect tolerance skills, understanding the function of SIB and suicidality, and building a collaborative therapeutic relationship (Chu 2011; ISSTD 2011; Klufft 1993b). After sufficient stabilization is established, patients may move into the second stage of treatment, which involves developing a narrative including nontraumatic and traumatic experiences. Patients strive to gain mastery over memories and resolve trauma-related cognitive distortions. Contrary to traditional exposure therapy for PTSD, however, trauma processing is carefully paced to provide patients with time to understand and integrate memories while continuing to focus on safety and stability. Experts do *not* recommend exploring traumatic memories every session, even during the trauma-processing stage (Brand et al. 2012; Klufft 1993a). The third stage involves reconnection with self and others and focuses on improved social functioning, among other topics.

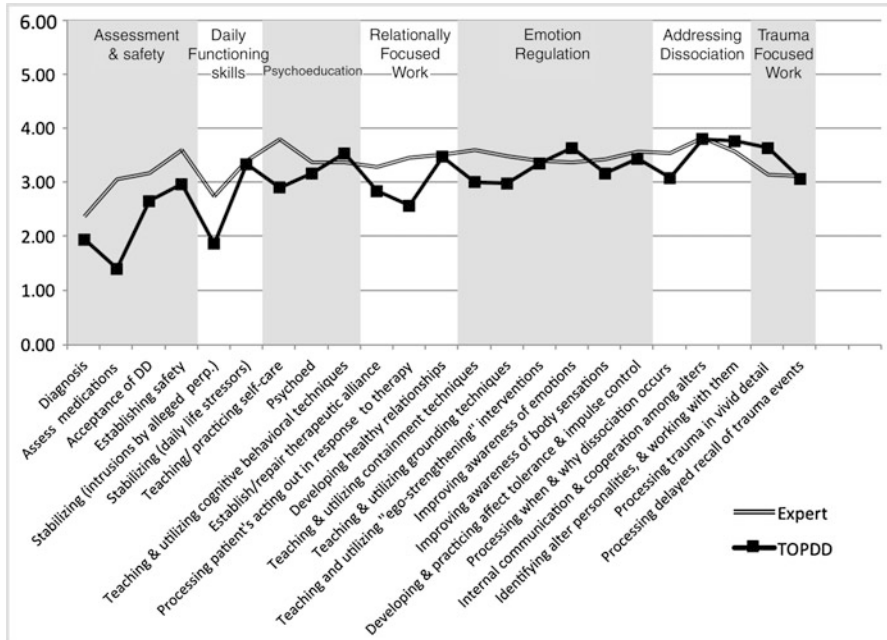
Experts generally agree that safety and symptom management are at the center of complex trauma/DD treatment (Brand 2001; ISSTD 2011). Surveys conducted with complex trauma/DD experts have highlighted the importance of emotion-focused and emotion regulation interventions (Brand et al. 2012; Cloitre et al. 2011). Thirty-six expert DD clinicians identified a core set of interventions to be used across treatment, targeting diagnosis, psychoeducation, affect modulation, impulse control, interpersonal skills, and stabilization from crises (Brand



**Fig. 3** Stage 1 Intervention profile (Myrick et al. (2015). Reprinted by permission of Taylor & Francis LLC (<http://www.tandfonline.com>))

et al. 2012). A recent DD outcome study found that clinicians who had been trained in treating DD generally reported using interventions consistent with experts’ recommendations across the first two stages of treatment; see Figs. 3 and 4 (Myrick et al. 2015). Further research with this sample found that patients improved during treatment.

*Treatment of Patients with Dissociative Disorders Study (TOP DD).* The TOP DD study, a longitudinal, naturalistic outpatient treatment study, has provided data supporting the effectiveness of DD treatment. TOP DD clinicians and one of their patients diagnosed with DID or DDNOS completed surveys about demographics, symptoms, progress in treatment, and treatment alliance. Over 30 months, patients demonstrated decreases in dissociative, PTSD, and general psychiatric symptomatology and increases in adaptive functioning (Brand et al. 2013). Secondary publications have concluded that young adult patients, while initially highly symptomatic, can benefit relatively quickly from DD treatment (Myrick et al. 2012), that revictimization and stressors may play an important role in the sudden worsening of symptoms in the minority of patients who showed worsening (Myrick et al. 2013), and that therapeutic alliance impacts outcome (Cronin et al. 2014).



**Fig. 4** Stage 2 Intervention profile (Myrick et al. (2015). Reprinted by permission of Taylor & Francis LLC (<http://www.tandfonline.com>))

## Key Facts About the Assessment of Dissociation and DID

- There are several well-validated self-report measures of dissociation.
- High rates of dissociation and DD are found in community and clinical samples.
- High levels of dissociation may impede or alter treatment outcome, making it crucial that researchers and clinicians routinely assess for dissociation.
- Those with complex trauma histories are at risk for being misclassified as feigning on some measures that assess exaggeration of symptoms because some of the so-called malingering scales include dissociative and other trauma-related symptoms.
- Patients with DD have high levels of a variety of psychiatric symptoms. Some of these symptoms are considered “rare” by some psychological tests utilizing validity scales that include trauma-related symptoms, making it more likely that DD patients may be misclassified as “exaggerating” or “malingering.” However, research shows DID can be distinguished from feigned DID (Brand and Chasson 2014; Brand et al. 2014b; Rogers et al. 2009).

## Key Facts About Treating Chronic Dissociative Disorders

- The DD field encourages a balanced approach to addressing self-states, neither treating them as separate people nor ignoring them.

- The primary goals of DD treatment include improved safety and regulation of emotion and impulses, increased self-awareness, effective negotiation of internal conflict among self-states, and improved adaptive functioning (Brand et al. 2012).
- There is not a single DID treatment study that supports the notion that DID treatment is harmful to patients. The authors of a recent review concluded that those who put forth this “harmful treatment” argument have overlooked the treatment outcome literature and their argument rests on opinion pieces, autobiographical accounts written by patients, non-peer-reviewed publications, and misrepresentations of the literature (Brand et al. 2014a).

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## Summary Points

- Dissociation is common in the general population, ranging from mild to severe detachment.
- Pathological dissociation affects approximately 2–18 % of individuals in the general population (Sar 2011).
- Current research supports the trauma model of dissociation and suggests that trauma plays an important role in the development and maintenance of dissociative symptoms.
- Complex trauma occurs when youth experience repetitive or prolonged abuse across developmental periods.
- Dissociative amnesia, depersonalization/derealization disorder, dissociative identity disorder, and other specified dissociative disorders are the DD recognized in the DSM-5.
- Recommended treatment for chronic DD involves a trauma-informed stage-based approach that targets safety and stabilization, carefully paced trauma processing, and reconnection and integration within the patient and a supportive community.

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