



# ***Managing Depression as a Chronic Condition***

D. Green MD

TOH/Bruyere Shared Care Program



# Financial disclosure

- None



# Objectives

- To review key concepts relevant to understanding the course of depression
- To illustrate how the PHQ-9 can be used to manage depression
- To review the chronic care model and relate it to the management of depression



# Conference Objectives

- **To assist mental health providers in conceiving, developing, and nurturing collaborative care models**
- To encourage educators in all relevant professions to embed collaborative principles in curricula
- To urge administrators and funders to develop and sustain collaborative service design to assist consumers to self-manage and ensure their voices “count”
- To facilitate research that informs collaborative structure, process, and evaluation



# Key Concepts

- Episode
- Response
- Remission
- Relapse
- Recovery
- Recurrence



# Case

- David is a 21 year old student who presents to his family physician with numerous symptoms of depression
- He has a past history of depression at age 18 that resolved without treatment
- There is a family history of depression (mother)
- His organic w/u is normal and he does not abuse substances
- There is no history of mania or hypomania
- His PHQ-9 score is 18



## Case (contd.)

- His family physician diagnoses him with a Major Depressive Episode and starts him on the antidepressant Mirtazapine as he is experiencing insomnia and significant weight loss with his depression
- He was not offered psychotherapy as an alternative as his family physician was not sure which type to recommend or if psychotherapy alone was sufficient



# Episode

- Defined as having a certain number of symptoms for a certain duration
- Usual approach is to follow the definition of a Major Depressive Episode as outlined in the DSM-IV-TR

# Diagnosis of Depression - DSM-IV-TR Criteria for Major Depressive Episode and Major Depressive Disorder

## Major depressive episode criterion:

- A. At least five of the following symptoms have been present during the same 2-week period and represent a change from previous functioning: at least one of the symptoms is either 1) depressed mood or 2) loss of interest or pleasure.
  - 1. Depressed mood most of the day, nearly every day, as indicated either by subjective report (e.g., feels sad or empty) or observation made by others (e.g., appears tearful)
  - 2. Markedly diminished interest or pleasure in all, or almost all, activities most of the day, nearly every day (as indicated either by subjective account or observation made by others)
  - 3. Significant weight loss when not dieting or weight gain (e.g., a change of more than 5% of body weight in a month), or decrease or increase in appetite nearly every day
  - 4. Insomnia or hypersomnia nearly every day
  - 5. Psychomotor agitation or retardation nearly every day (observable by others, not merely subjective feelings of restlessness or being slowed down)
  - 6. Fatigue or loss of energy nearly every day
  - 7. Feelings of worthlessness or excessive or inappropriate guilt (which may be delusional) nearly every day (not merely self-reproach or guilt about being sick)
  - 8. Diminished ability to think or concentrate, or indecisiveness, nearly every day (either by subjective account or as observed by others)
  - 9. Recurrent thoughts of death (not just fear of dying), recurrent suicidal ideation without a specific plan, or a suicide attempt or specific plan for committing suicide
- B. The symptoms do not meet criteria for a mixed episode.
- C. The symptoms cause clinically significant distress or impairment in social, occupational, or other important areas of functioning.
- D. The symptoms are not due to the direct physiological effects of a substance (e.g. a drug of abuse, a medication) or a general medical condition (e.g., hypothyroidism).
- E. The symptoms are not better accounted for by bereavement, i.e., after the loss of a loved one, the symptoms persist for longer than 2 months or are characterized by marked functional impairment, morbid preoccupation with worthlessness, suicidal ideation, psychotic symptoms, or psychomotor retardation.

## Major depressive disorder, single episode criterion:

- A. Presence of a single major depressive episode.
- B. The major depressive episode is not better accounted for by schizoaffective disorder and is not superimposed on schizophrenia, schizophreniform disorder, delusional disorder, or psychotic disorder not otherwise specified.
- C. There has never been a manic episode, a mixed episode, or a hypomanic episode.

## Major depressive disorder, recurrent criterion:

- A. Presence of two or more major depressive episodes (each separated by at least 2 months in which criteria are not met for a major depressive episode.)
- B. The major depressive episodes are not better accounted for by schizoaffective disorder and are not superimposed on schizophrenia, schizophreniform disorder, delusional disorder, or psychotic disorder not otherwise specified.
- C. There has never been a manic episode, a mixed episode, or a hypomanic episode.

## PATIENT HEALTH QUESTIONNAIRE-9 (PHQ-9)

Over the last 2 weeks, how often have you been bothered by any of the following problems?  
(Use "✓" to indicate your answer)

	Not at all	Several days	More than half the days	Nearly every day
1. Little interest or pleasure in doing things	0	1	2	3
2. Feeling down, depressed, or hopeless	0	1	2	3
3. Trouble falling or staying asleep, or sleeping too much	0	1	2	3
4. Feeling tired or having little energy	0	1	2	3
5. Poor appetite or overeating	0	1	2	3
6. Feeling bad about yourself — or that you are a failure or have let yourself or your family down	0	1	2	3
7. Trouble concentrating on things, such as reading the newspaper or watching television	0	1	2	3
8. Moving or speaking so slowly that other people could have noticed? Or the opposite — being so fidgety or restless that you have been moving around a lot more than usual	0	1	2	3
9. Thoughts that you would be better off dead or of hurting yourself in some way	0	1	2	3

FOR OFFICE CODING 0 + 2 + 4 + 12  
=Total Score: 18

If you checked off any problems, how difficult have these problems made it for you to do your work, take care of things at home, or get along with other people?

Not difficult at all

Somewhat difficult

Very difficult

Extremely difficult



For additional info on how to use PHQ-9 in depression care go to:

- <http://www.depression-primarycare.org/>
  - Go to Resources for clinicians> Clinical practice tools > PHQ-9



# Where to find PHQ-SADS

- [www.phqscreeners.com](http://www.phqscreeners.com)



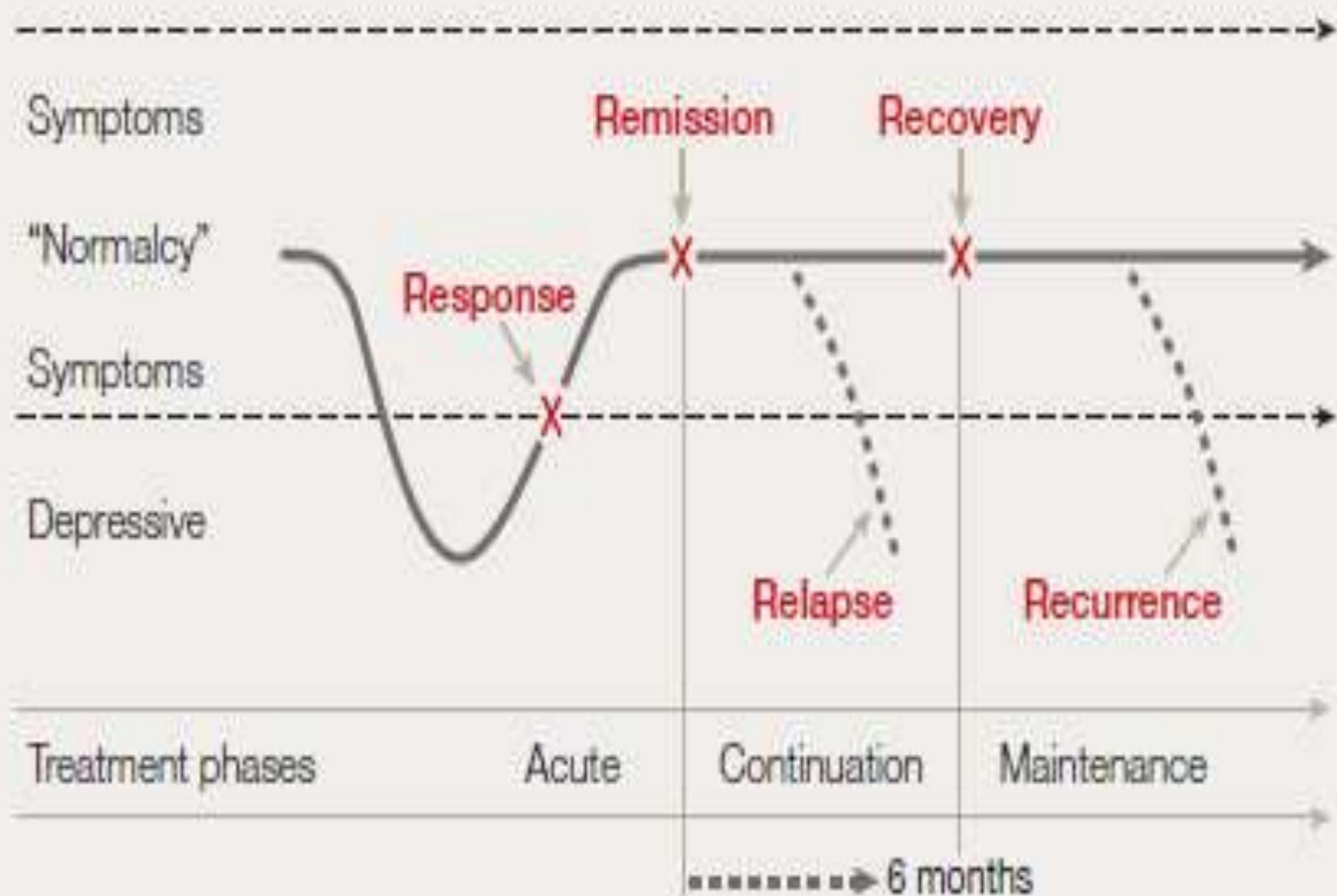
## Case (contd.)

- He is seen after 4 weeks and his PHQ-9 score has dropped to 8
- David has had a response to treatment



# Response

- Related to a treatment intervention
- Often defined in intervention studies (with either medication or psychotherapy) as  $> 50\%$  reduction in score using a standard depression rating scale





## Case (contd.)

- After 8 weeks his PHQ-9 score has dropped to 4
- David is now considered to be in full remission (PHQ-9 score <5)
- if his PHQ-9 score had remained unchanged at 8 he would be considered in partial remission



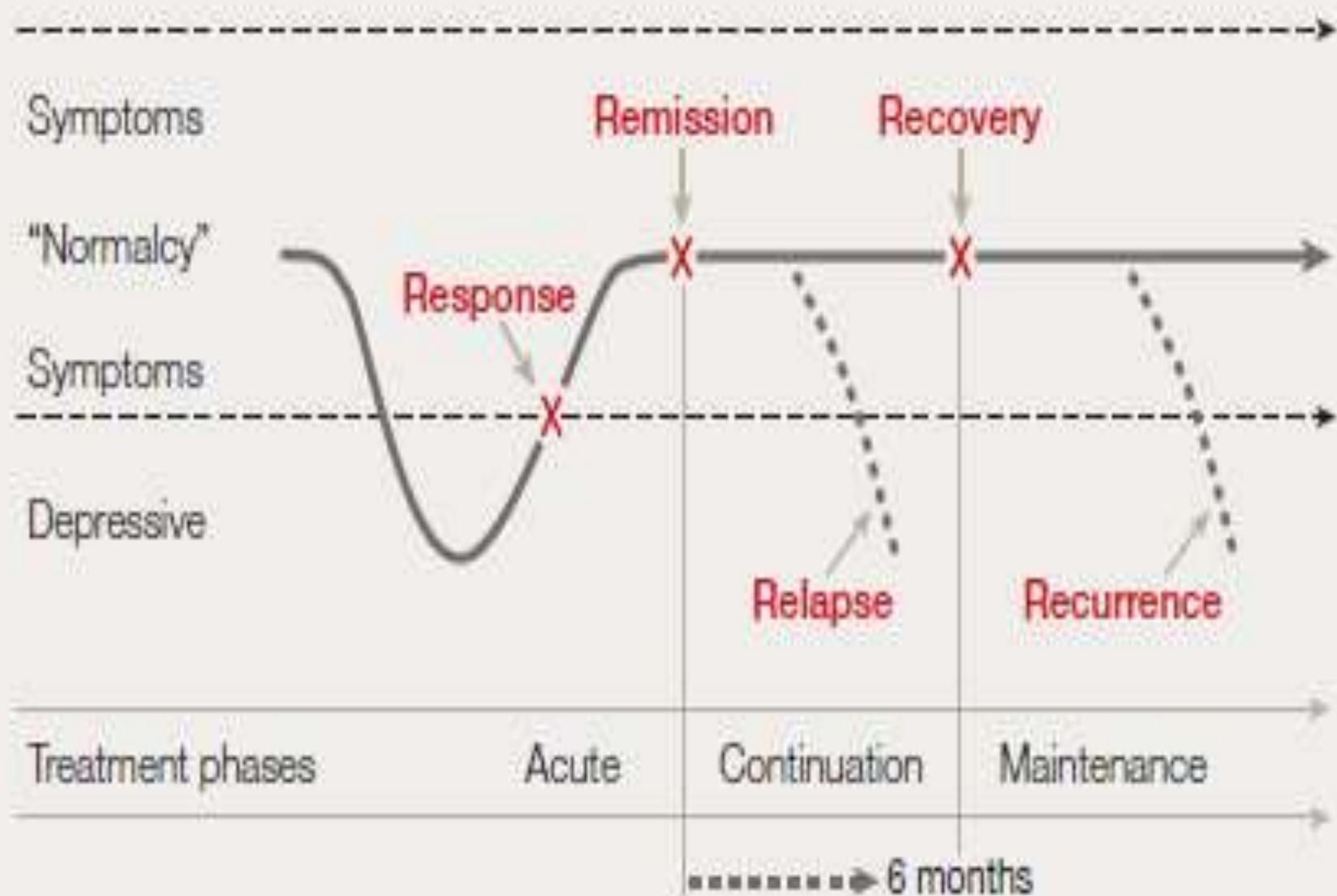
# Remission

- It is defined by a period of time in which an individual no longer meets criteria for the disorder
- Remission can be either partial or full
- In partial remission an individual still has more than minimal symptoms



# Remission (contd.)

- Full remission is defined as the point at which an individual no longer meets criteria for the episode and has no more than minimal symptoms
- Note that full remission does not necessarily imply the absence of any symptoms
- A remission may or may not be related to an intervention
- PHQ-9 < 5 used as cutoff for full remission





# Key concepts

- Episode, response and remission are all acute phenomena
- Refer to an acute episode of the illness, which is called Major Depressive Disorder



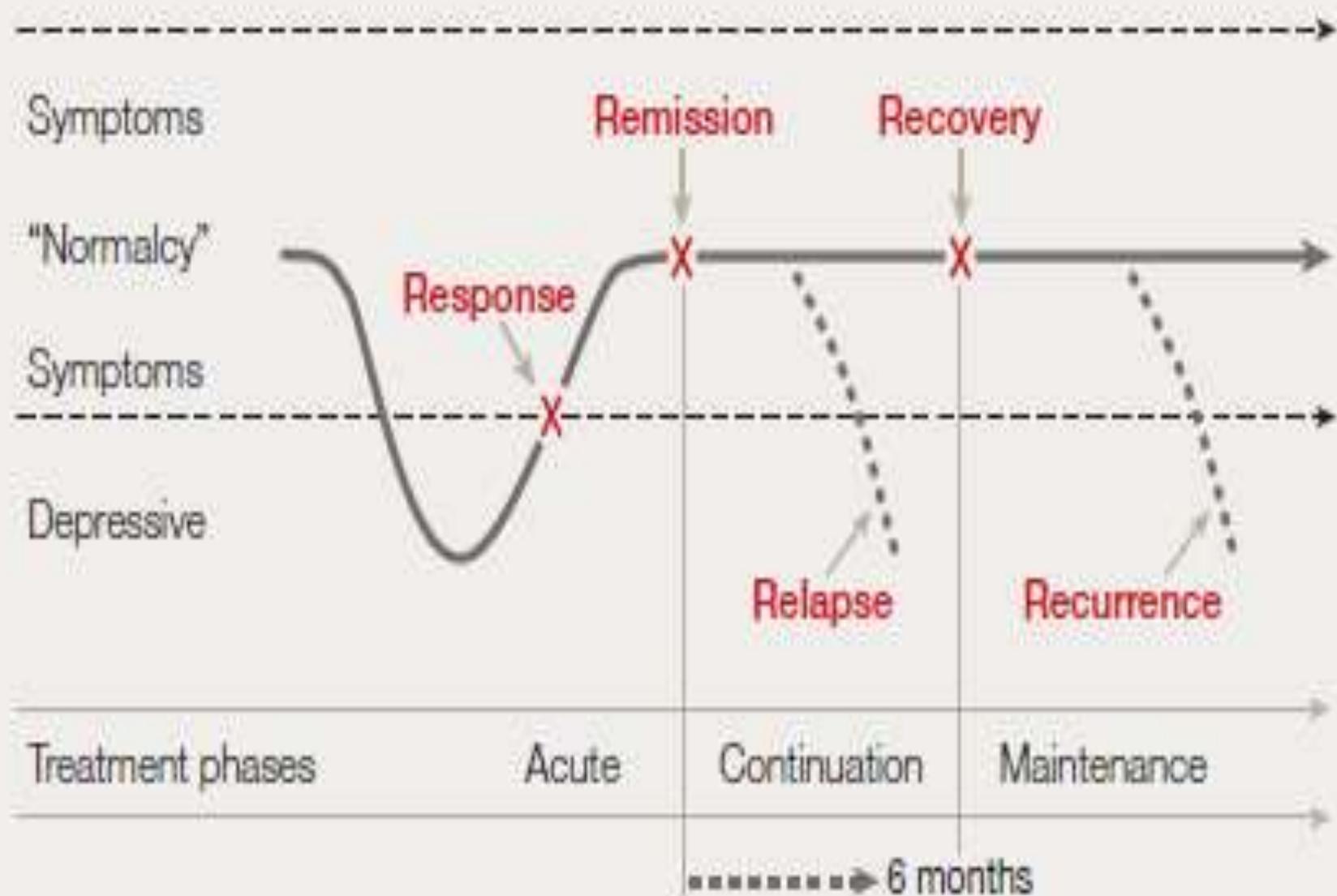
## Case (contd.)

- David remains well and is followed regularly in the family medicine clinic at 3 month intervals
- His PHQ-9 score at 6 months remains at 4
- David is now considered to be in recovery



# Recovery

- Defined as full remission that lasts for a defined period e.g. 4-9 months
- Conceptually it does not signify the end of the illness itself i.e. patient continues to have a diagnosis of Major Depressive Disorder (even though now may have been asymptomatic for a period of time)





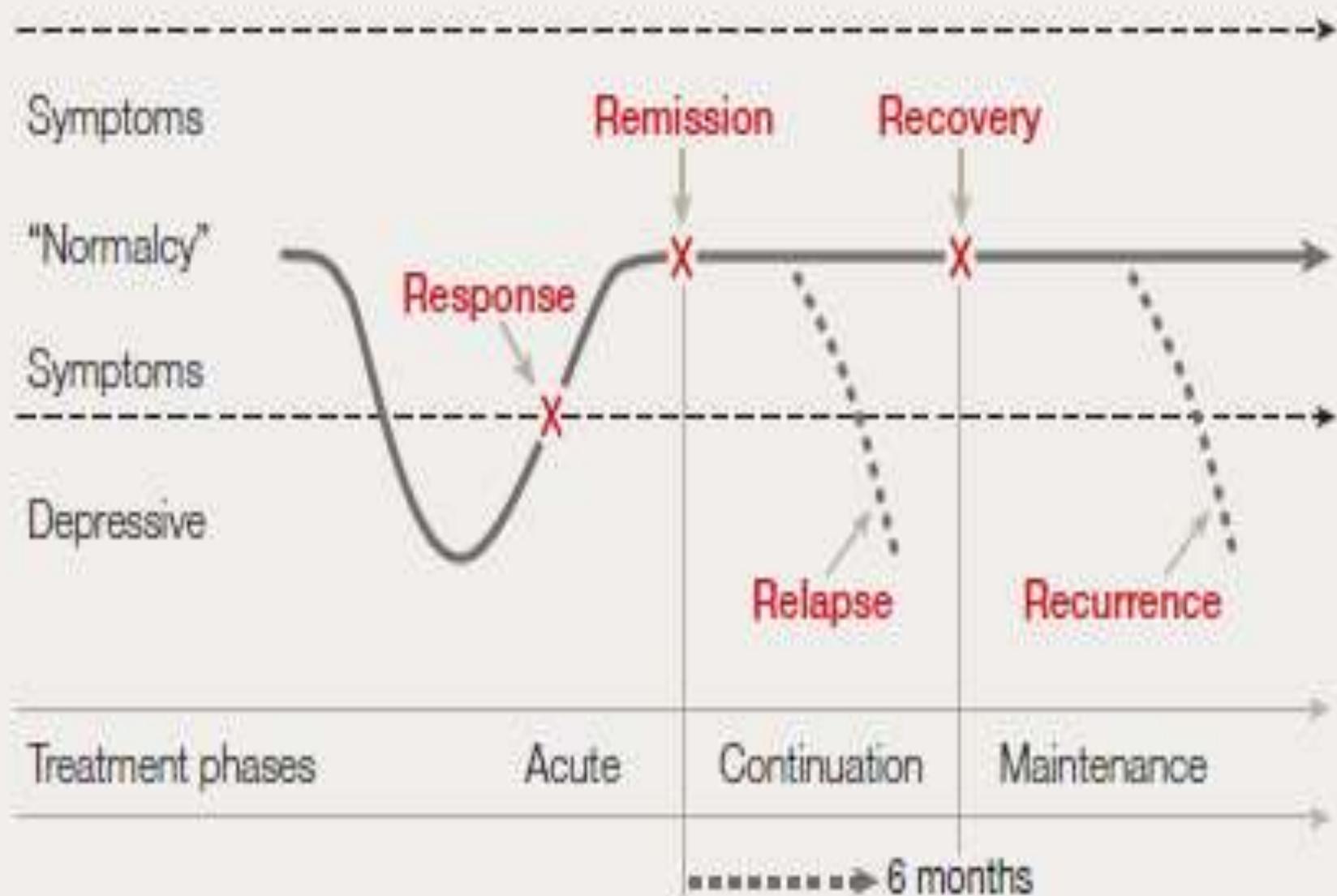
## Case (contd.)

- 2 years later he comes to the clinic with complaints of anxiety and insomnia
- David admitted he had stopped his antidepressant one year before as he was feeling well
- His PHQ-9 score is elevated at 20 and he is again diagnosed with a Major Depressive Episode
- He has suffered a recurrence of his Major Depressive Disorder (MDD)



# Recurrence

- Refers to a new episode occurring after recovery from a previous episode





## Case (contd.)

- At this point he was referred to the Shared Care Mental Health Team and his Mirtazapine was restarted
- His Mirtazapine was further increased by the Shared Care team and after several months of treatment his PHQ-9 had decreased to 9 and he was in partial remission from his MDD
- He remained anxious about school however and one month later his insomnia worsened as did his depressive symptoms and his PHQ-9 score rose to 15 and he again met criteria for a Major Depressive Episode
- David had suffered a relapse of his MDD

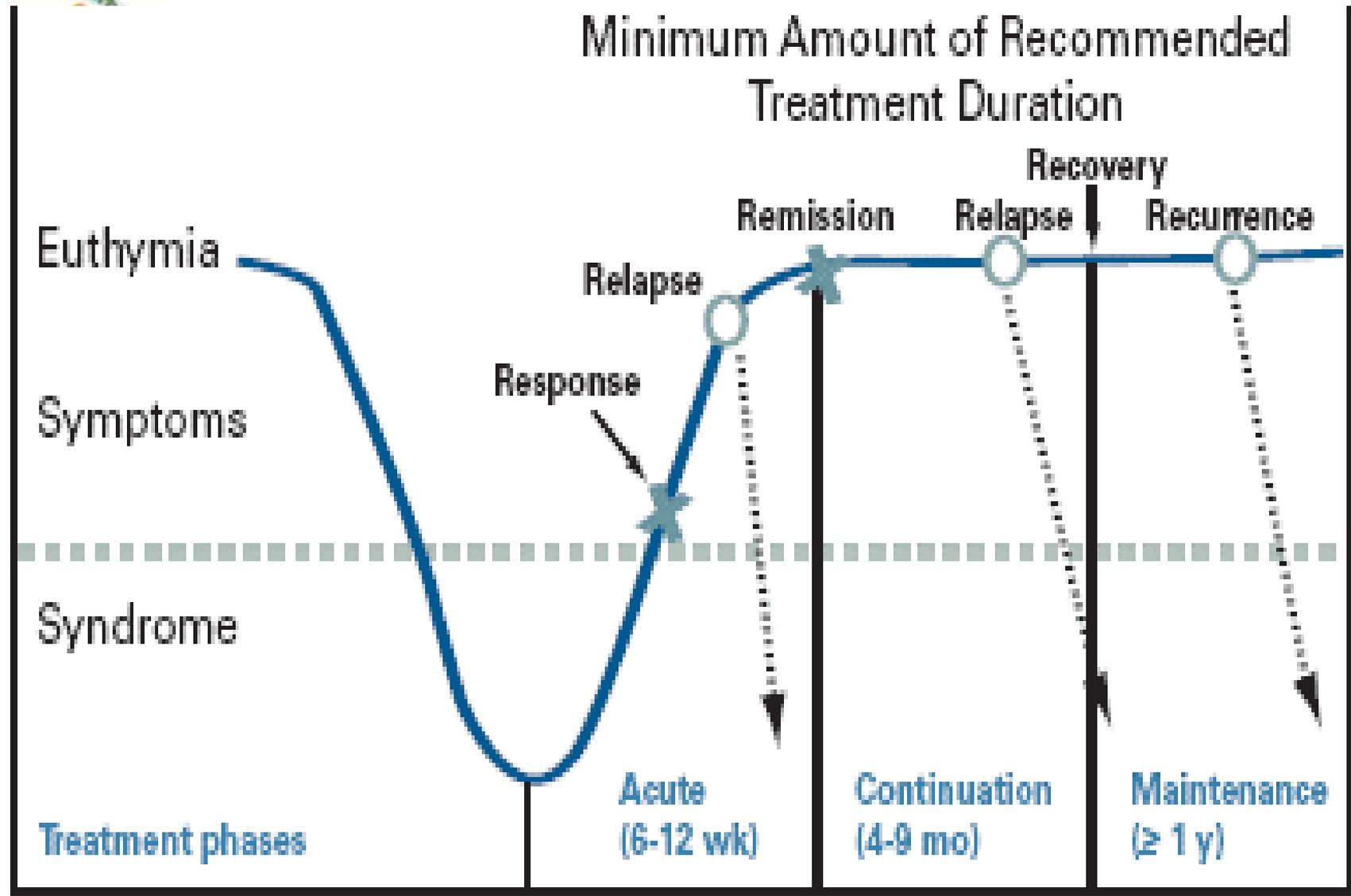


# Relapse

- Defined as the early return (during the first 4-9 months) of symptoms following either response or remission (either partial or full) of symptoms leading to criteria again being met for a MDE

# Minimum Amount of Recommended Treatment Duration

Increased Severity



Time



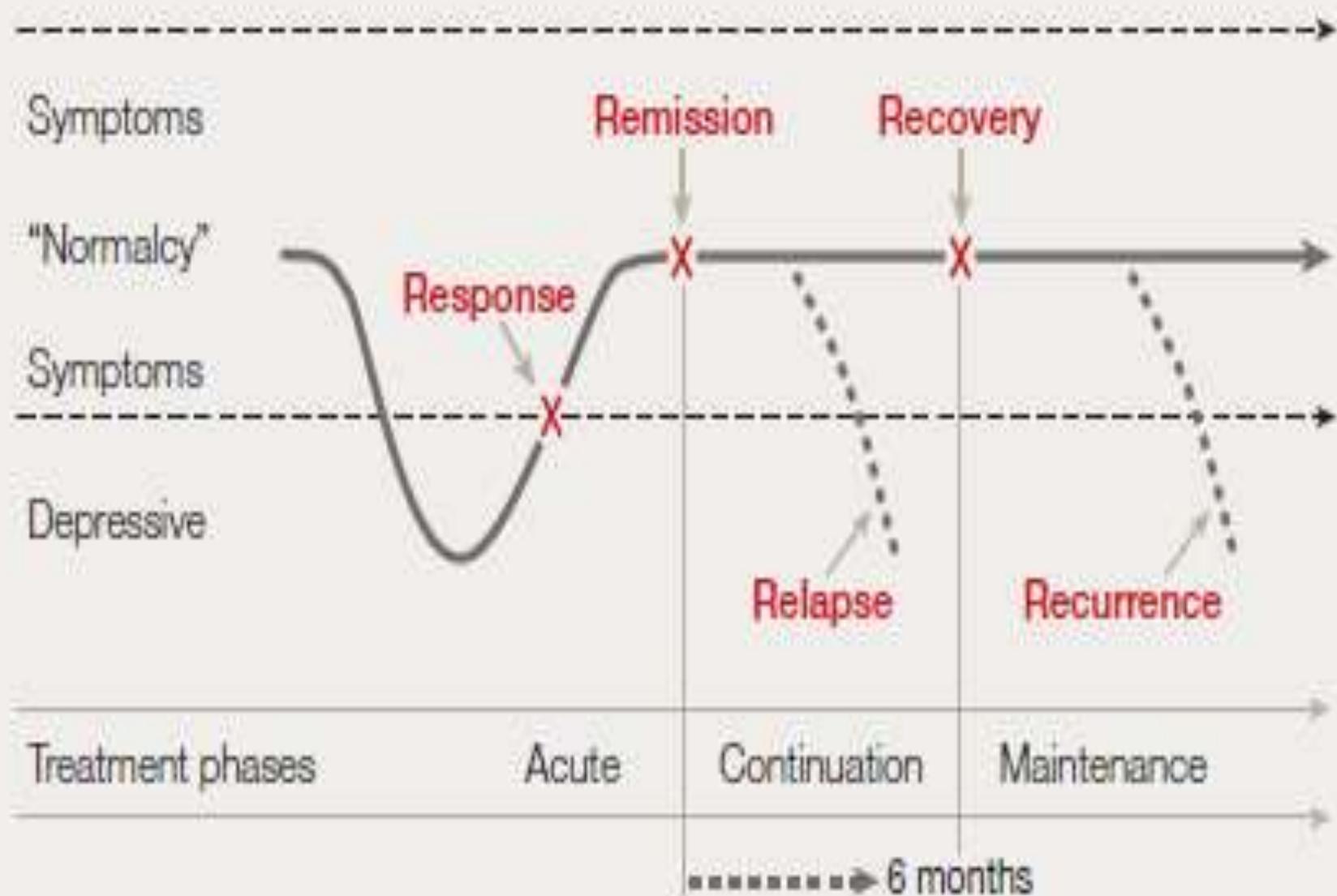
## Case (contd.)

- At this point he was offered CBT which was provided by a psychiatry resident receiving training in this modality
- He was followed regularly by the Shared Care nurse and social worker by phone and in person and eventually went into full remission
- His condition has remained somewhat fragile but he has been able to remain free from MDE for the last several years with f/u alternating between the family health team and Shared Care every 3 months



# Phases of treatment

- Acute phase- refers to treatment of acute episode. *Note: there is no defined time period for this phase.*
- Continuation phase – refers to period of treatment following remission of symptoms, which is variously defined as 4-9 months
- Maintenance phase- refers to treatment after recovery occurs





# Goals of treatment

- Acute phase – aims to minimize depressive symptoms and achieve remission
- Continuation phase – aim to prevent return of symptoms *during the current episode*
- Maintenance phase – focus is to prevent lifetime return of new episodes



# Depression in Primary Care

- One of the commonest conditions managed in primary care with the point prevalence ranging from 4.8% to 8.6%
- It is often a recurrent, rather the episodic condition
  - About 60% who are recognized by their family physician as having a major depression have had 2 or more prior episodes
  - 36% have a recurrence within one year of symptom resolution



What factors are associated with relapse, recurrence and chronicity of depression?



# Factors moderating course

- Age of onset
  - Earlier onset appears to be associated with poorer outcomes including:
    - a longer time to remission
    - Lower likelihood of remission
    - Poorer symptomatic improvement
  - Late onset depression may be associated with more rapid time to recurrence



# Factors moderating course

- Number of previous episodes
  - One study demonstrated that the risk of recurrence increased by 16% with each subsequent episode
  - Mean time to recurrence decreased with each subsequent episode
  - Risk of recurrence may diminish as duration of recovery increases



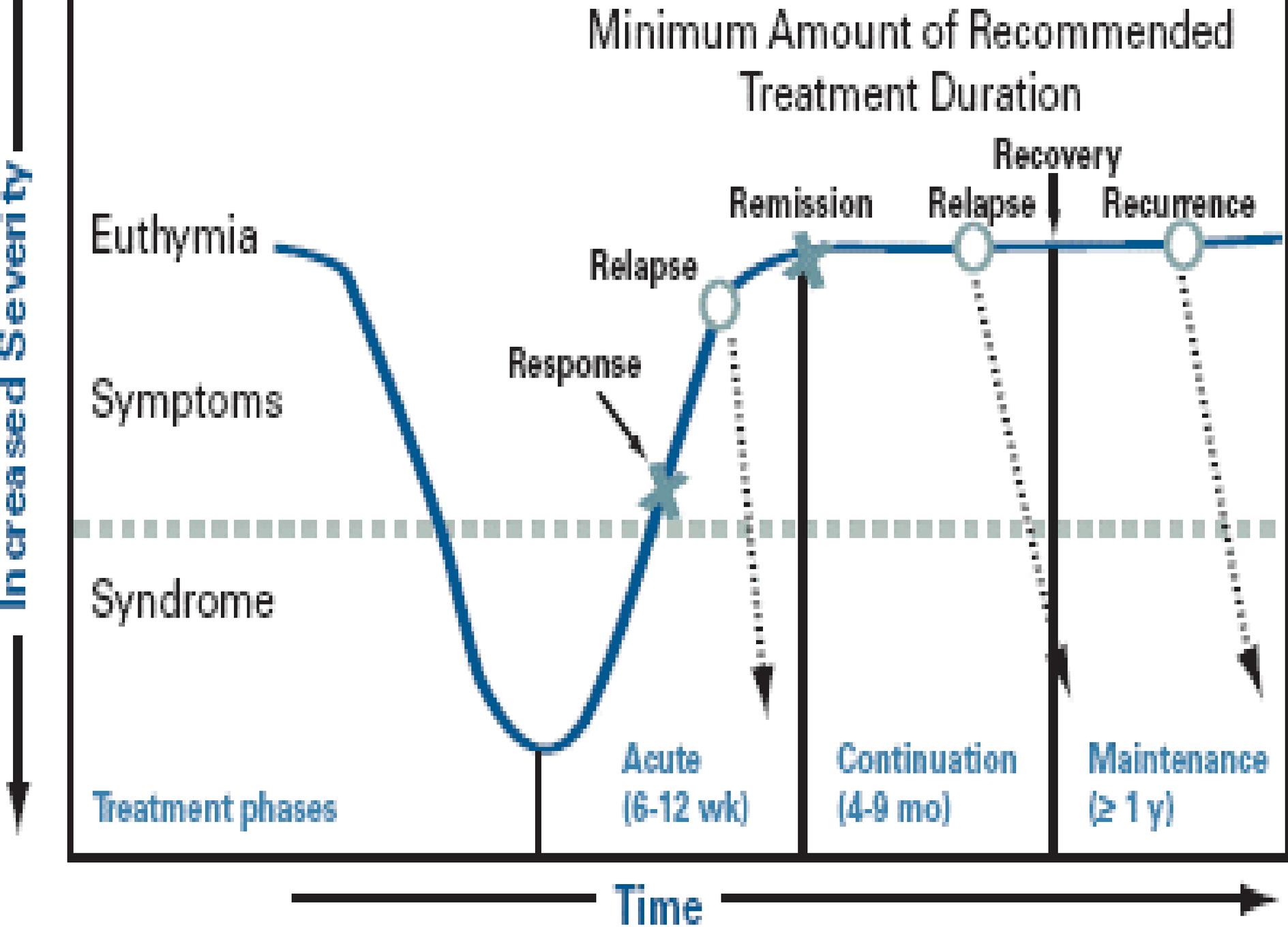
# Factors moderating course

- Greater severity of index episode of depression appears to be associated with greater risk of recurrence
- Family history of depression may also increase risk



# Factors moderating course

- Presence of residual symptoms
  - STARD trial and other studies have demonstrated a poorer outcome for those with lingering symptoms following treatment for the acute depressive episode
  - These patients are much more likely to relapse





# Factors moderating course

- Comorbidity
  - *Double depression* (slower rate of recovery and greater risk of recurrence)
  - *Anxiety disorders* (may lead to worse outcomes and often associated with more severe depressive symptoms)
  - *Personality disorder or traits*
  - *Substance abuse*
  - *Comorbid medical illness*



# Treatment of depression in primary care

- Historically, the model of care for depression has been characterized by a focus on acute treatment with short, and often unprepared, appointments which are usually patient-initiated
- Follow up is often not adequate and many patients stop their medications prematurely
- This model does not fit with the chronic or relapsing and recurring nature of depression which many of our patients experience



# The Chronic Disease Model (CCM)

- In the later part of the 20<sup>th</sup> century researchers began to develop care models for the assessment and treatment of the chronically ill
- Edward H. Wagner, Director of the MacColl Institute for Healthcare Innovation and Director of the The Robert Wood Foundation national program “Improving Chronic Illness Care” developed the Chronic Care Model, or CCM



# Elements of the CCM

- System Design
- Self-management support
- Decision support
- Information systems
- Organizational change
- Links with community resources

# The Chronic Care Model



# Chronic Disease Management for Depression in Primary Care: A Summary of the Current Literature and Implications for Practice

Nick Kates, MB, BS, FRCPC<sup>1</sup>, Michele Mach, BA, (H)BSW, MSW, RSW<sup>2</sup>

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**Objective:** To review randomized controlled trials (RCTs) evaluating chronic disease management models for depression in primary care and to look at the implications for clinical practice in Canada.

**Methods:** We reviewed all RCTs conducted between 1992 and 2006, including other reviews and analyses of pooled data. Using various search terms, we searched PsycINFO, Cinahl (1982 to May 2005), MEDLINE (1995 to 2005), EMBASE, The Cochrane Library, and PubMed.

**Results:** There is conclusive evidence for the benefits of changing systems of care delivery to support the more effective management of depression in primary care. Most studies have demonstrated improved outcomes in terms of symptom reduction, relapse prevention, functioning in the community, adherence to treatment, community and workplace involvement, and satisfaction with care received.

**Conclusions:** Primary care practices need to examine how they can incorporate different concepts and models for managing depression. Components to consider include case registries, care managers or coordinators, treatment algorithms, follow-up and monitoring after a treated episode, care and relapse prevention plans, visits by psychiatrists, and training and ongoing education for all providers.

(Can J Psychiatry 2007;52:77–85)

Information on funding and support and author affiliations appears at the end of the article.



# System Design

- Use of 2 question screen for depression as well as screening instrument such as the PHQ-9 targeting high risk populations\*
- A care manager responsible for coordinating and assisting patients in using community resources and in monitoring adherence and response to treatment\*
- Visits from a psychiatrist who will consult with the family physician and case manager and see complex cases as required\*



# System Design

- Greater use of telephone for monitoring treatment compliance and response and for proactive follow-up of patients at risk
- Prepared visits for which team ensures that all relevant data and required resources are available before patient arrives
- Regular visits or telephone check-ups after the treatment has been completed



# Decision Support

- Incorporation within the clinical record of a guideline-based care and treatment algorithm for depression
- Adequate preparation and ongoing education for all primary care staff



# Using PHQ-9 Diagnosis and Score for Initial Treatment Selection

PHQ-9 Score	Provisional Diagnosis	Treatment Recommendations
5-9	Minimal Symptoms	Support Educate to call if worse; return in 1 month
10-14	Minor depression++	Support, watchful waiting
10-14	Dysthymia	Antidepressant or psychotherapy
10-14	Major depression, <i>mild</i>	Antidepressant or psychotherapy
15-19	Major depression, moderately severe	Antidepressant or Psychotherapy
≥20	Major Depression, severe	Antidepressant and psychotherapy (especially if not improved on monotherapy)



# Information systems

- Development of registries that include every individual in a practice with a prior history of depression so that these individuals can be monitored and proactive care initiated
- Feedback of performance data



# Self-management support

- Development of a care plan that includes the patient's personal goals and current treatment
- Educating patients and their families and activating patients through provider-assisted behaviourally-oriented interventions such as problem-solving therapy (PST) or CBT
- A plan to prevent relapse after recovery from an episode



# Conclusions

- It is helpful to understand the concepts of episode, response, remission, recovery, relapse and recurrence when managing and designing systems of care for depression
- The PHQ-9 can be useful tool in managing depression
- The Chronic Care Model (CCM) provides a framework for considering how to develop collaborative systems of care in the management of depression