Blood urea nitrogen (BUN) and creatinine are waste products in the blood that are used to evaluate kidney function. Kidney function is already considerably impaired by the time these values rise.

**BLOOD UREA NITROGEN (BUN)**

In underwriting, more emphasis will be put on serum creatinine. Therefore, most elevations of BUN (up to 50 mg/ dl) will be disregarded if creatinine is normal. If the creatinine is elevated (≥1.51), and the BUN is between 26 and 40 mg/dl, rate as indicated in the rating chart below. If creatinine is elevated (≥1.6) and the BUN is > 40mg/dl, the applicant will usually be declined.

**CREATININE**

While creatinine clearance is the gold standard for assessing kidney function, it requires a 24-hour urine collection. Unfortunately, collections of urine are difficult to obtain. Patients often fail to follow collection procedures correctly, and improper collection can invalidate the results. Expected value for creatinine clearance is 90-130 ml/min.

An estimate of creatinine clearance (i.e., that is, how well the kidneys are excreting creatinine) can be obtained from a mathematical formula using age, serum creatinine, and height. This calculated creatinine clearance will be used in underwriting adult applicants.
UNDERWRITING GUIDELINES:

Elevated creatinine over 2 mg/dl is generally declined. For elevated creatinine (1.6 mg/dl - 2.0 mg/dl) of unknown cause in adults with completely normal urinalysis, enter calculated creatinine clearance in the table below:

\[
\text{Creatinine Clearance} = (140 - \text{age}) \times \text{ideal weight in kilograms} \times (0.85 \text{ for women}) \times \frac{72}{\text{serum creatinine (mg/dl)}}
\]

<table>
<thead>
<tr>
<th>Age</th>
<th>Creatinine Clearance</th>
<th>Debits</th>
</tr>
</thead>
<tbody>
<tr>
<td>18–55</td>
<td>≥70</td>
<td>0</td>
</tr>
<tr>
<td>55–69</td>
<td>≥70</td>
<td>0</td>
</tr>
<tr>
<td>&lt;55</td>
<td>≥55</td>
<td>Postpone</td>
</tr>
<tr>
<td>56–74</td>
<td>≥65</td>
<td>0</td>
</tr>
<tr>
<td>50–64</td>
<td>100</td>
<td>100</td>
</tr>
<tr>
<td>&lt;50</td>
<td></td>
<td>Postpone</td>
</tr>
<tr>
<td>75+</td>
<td>≥50</td>
<td>0</td>
</tr>
<tr>
<td>35–49</td>
<td>100</td>
<td>100</td>
</tr>
<tr>
<td>&lt;35</td>
<td></td>
<td>Decline</td>
</tr>
</tbody>
</table>

If a diagnosis of kidney disease has been made, e.g., DM, SLE, renal disease, etc., use the guidelines for that disorder. Decline if there is evidence of progressive decline in kidney function, e.g., rising creatinine and/or decreasing creatinine clearance. Postpone for evaluation of renal disease if urine is abnormal (positive hemoglobin, >4 RBCs, any casts (other than hyaline), or ratable protein/albumin) and KFT’s are abnormal.

To get an idea of how a client with a history of kidney function tests would be viewed in the underwriting process, use the Ask “Rx”pert Underwriter on the next page for an informal quote.
### Ask “Rx”pert Underwriter (Ask Our Expert)

After reading the *Rx for Success* on Kidney Function Tests, please feel free to use this Ask “Rx”pert Underwriter for an informal quote.

<table>
<thead>
<tr>
<th>Producer ______________________________</th>
<th>Phone ______________________________</th>
<th>Fax ______________________________</th>
</tr>
</thead>
<tbody>
<tr>
<td>Client ______________________________</td>
<td>Age/DOB __________________________</td>
<td>Sex _____________________________</td>
</tr>
</tbody>
</table>

If your client has abnormal kidney function tests, please answer the following:

#### 1. Please list diagnosis.

_________________________________________________________________________________________________________________

#### 2. Please check if condition is present.

- [ ] Diabetes
- [ ] Polycystic kidney disease
- [ ] Glomerulonephritis
- [ ] Nephrosclerosis
- [ ] Systemic lupus erythematosus
- [ ] Other

#### 3. Is your client on any medications?

- [ ] Yes. Please give details. ______________________________________________________
- [ ] No

#### 4. Please give most recent results of kidney function tests.

- [ ] BUN _________________________________________________________________
- [ ] Serum creatinine _______________________________________________________
- [ ] Urinalysis ____________________________________________________________

#### 5. Please provide height and weight.

_________________________________________________________________________________________________________________

#### 6. Please note if any of the following have occurred (Check all that apply):

- [ ] Frequent infection
- [ ] High blood pressure
- [ ] Cardiovascular disease

#### 7. Has your client smoked cigarettes in the last 12 months?

- [ ] Yes  [ ] No

#### 8. Does your client have any other major health problems (e.g., cancer, etc.)?

- [ ] Yes. Please give details. ________________________________________________
- [ ] No