



# RM

# Costruzioni Elettroniche

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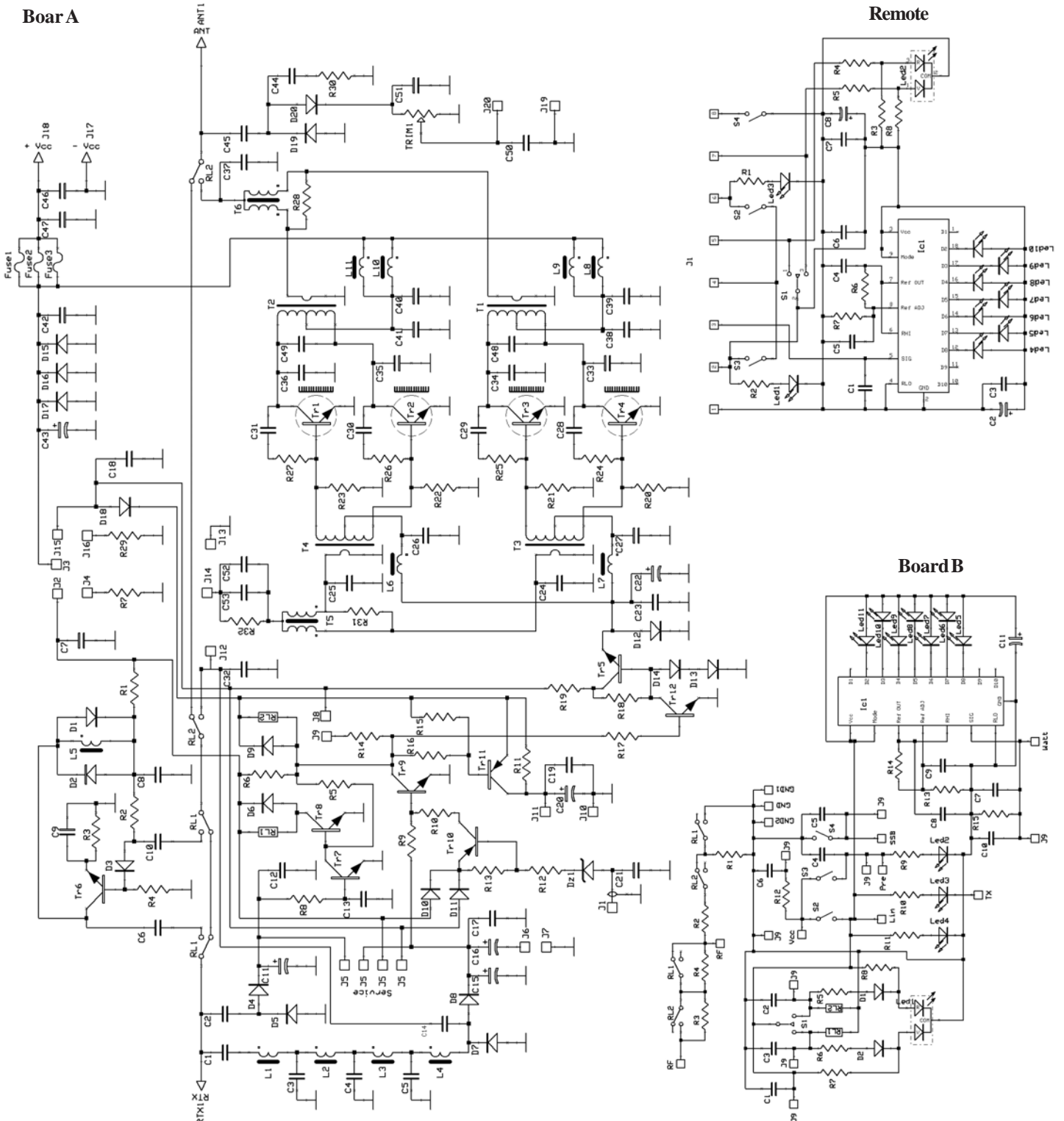
E-MAIL [ufftec@rmitaly.com](mailto:ufftec@rmitaly.com)

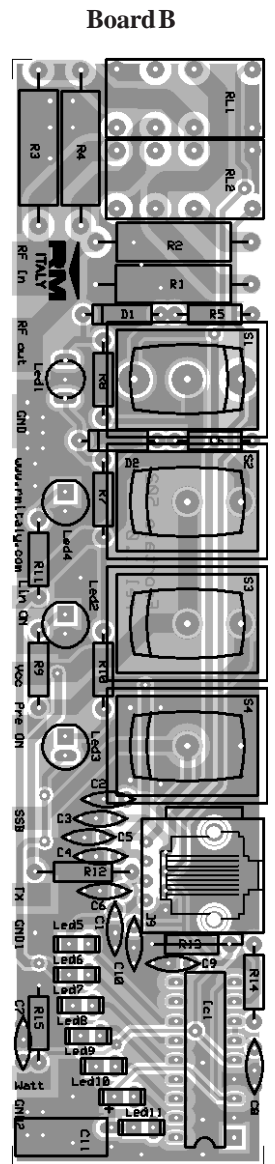
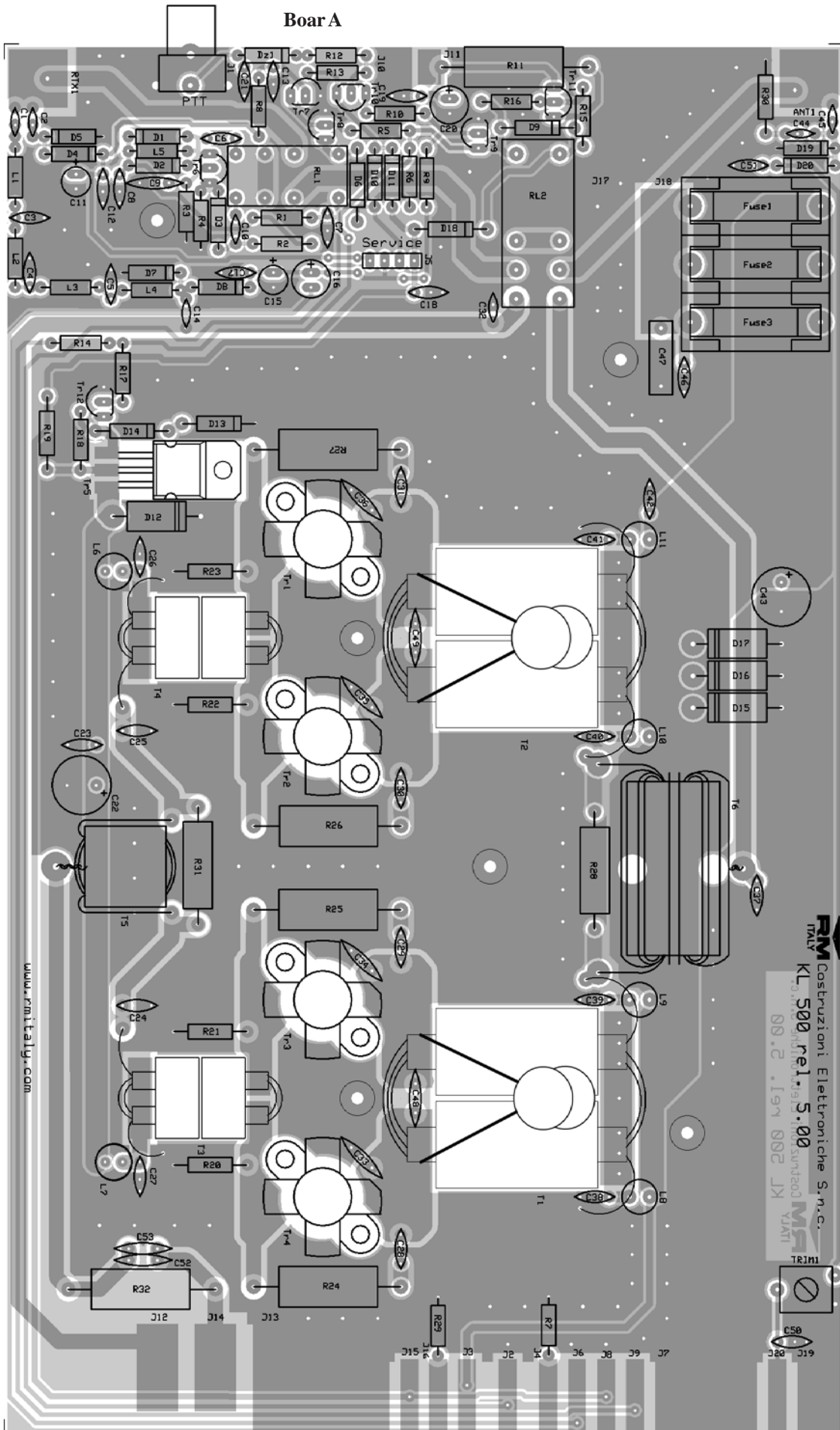
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## Mod. KL 501 linear amplifier

### Schematic diagram

Version 5.00





## List of components board A

C <sub>1</sub>	= 3.3 pF	50 V	NP0	C <sub>48</sub>	= 220 + 270 pF	500 V	N750
C <sub>2</sub>	= 8.2 pF	50 V	NP0	C <sub>49</sub>	= 220 + 270 pF	500 V	N750
C <sub>3</sub>	= 100 pF	50 V	NP0	C <sub>50</sub>	= 10 nF	50 V	
C <sub>4</sub>	= 100 pF	50 V	NP0	C <sub>51</sub>	= 100 nF	50 V	
C <sub>5</sub>	= 82 pF	50 V	NP0	C <sub>52</sub>	= 180 pF	500 V	N750
C <sub>6</sub>	= 150 pF	50 V	NP0	C <sub>53</sub>	= 180 pF	500 V	N750
C <sub>7</sub>	= 10 nF	50 V		R <sub>1</sub>	= 100 Ω	¼W	
C <sub>8</sub>	= 10 nF	50 V		R <sub>2</sub>	= 12 KΩ	¼W	
C <sub>9</sub>	= 470 pF	50 V	N750	R <sub>3</sub>	= 100 Ω	¼W	
C <sub>10</sub>	= 56 pF	50 V	NP0	R <sub>4</sub>	= 2.2 KΩ	¼W	
C <sub>11</sub>	= 10 μF	16 V		R <sub>5</sub>	= 12 KΩ	¼W	
C <sub>12</sub>	= 10 nF	50 V		R <sub>6</sub>	= 4.7 KΩ	¼W	
C <sub>13</sub>	= 10 nF	50 V		R <sub>7</sub>	= 1.0 KΩ	¼W	
C <sub>14</sub>	= 5.6 pF	50 V	NP0	R <sub>8</sub>	= 2.2 KΩ	¼W	
C <sub>15</sub>	= 2.2 μF	16 V		R <sub>9</sub>	= 2.2 KΩ	¼W	
C <sub>16</sub>	= 47 μF	16 V		R <sub>10</sub>	= 2.2 KΩ	¼W	
C <sub>17</sub>	= 10 nF	50 V		R <sub>11</sub>	= 47 Ω	5W	
C <sub>18</sub>	= 10 nF	50 V		R <sub>12</sub>	= 12 KΩ	¼W	
C <sub>19</sub>	= 10 nF	50 V		R <sub>13</sub>	= 2.2 KΩ	¼W	
C <sub>20</sub>	= 10 μF	16 V		R <sub>14</sub>	= 1.0 KΩ	¼W	
C <sub>21</sub>	= 10 nF	50 V		R <sub>15</sub>	= 1.0 KΩ	¼W	
C <sub>22</sub>	= 470 μF	25 V		R <sub>16</sub>	= 4.7 KΩ	¼W	
C <sub>23</sub>	= 100 nF	50 V		R <sub>17</sub>	= 12 KΩ	¼W	
C <sub>24</sub>	= 150 pF	50 V	NP0	R <sub>18</sub>	= 680 Ω	¼W	
C <sub>25</sub>	= 150 pF	50 V	NP0	R <sub>19</sub>	= 1.0 Ω	½W	
C <sub>26</sub>	= 10 nF	50 V		R <sub>20</sub>	= 10 Ω	½W	
C <sub>27</sub>	= 10 nF	50 V		R <sub>21</sub>	= 10 Ω	½W	
C <sub>28</sub>	= 47 nF	50 V		R <sub>22</sub>	= 10 Ω	½W	
C <sub>29</sub>	= 47 nF	50 V		R <sub>23</sub>	= 10 Ω	½W	
C <sub>30</sub>	= 47 nF	50 V		R <sub>24</sub>	= 68 Ω	2W	
C <sub>31</sub>	= 47 nF	50 V		R <sub>25</sub>	= 68 Ω	2W	
C <sub>32</sub>	= 47 pF	50 V		R <sub>26</sub>	= 68 Ω	2W	
C <sub>33</sub>	= 180 pF	500 V	N750	R <sub>27</sub>	= 68 Ω	2W	
C <sub>34</sub>	= 180 pF	500 V	N750	R <sub>28</sub>	= 100 Ω	2W	
C <sub>35</sub>	= 180 pF	500 V	N750	R <sub>29</sub>	= 1.0 KΩ	¼W	
C <sub>36</sub>	= 180 pF	500 V	N750	R <sub>30</sub>	= 27 Ω	½W	
C <sub>37</sub>	= 68 pF	500 V	NP0	R <sub>31</sub>	= 100 Ω	2W	
C <sub>38</sub>	= 100 nF	50 V		R <sub>32</sub>	= 33 Ω	5W	
C <sub>39</sub>	= 100 nF	50 V		TRIM <sub>1</sub>	= 10 KΩ		
C <sub>40</sub>	= 100 nF	50 V		D <sub>1</sub> = D <sub>2</sub> = D <sub>3</sub> = D <sub>4</sub> = D <sub>5</sub> = D <sub>7</sub> = D <sub>8</sub>	= 1N4148		
C <sub>41</sub>	= 100 nF	50 V		D <sub>10</sub> = D <sub>11</sub> = D <sub>19</sub> = D <sub>20</sub>	= 1N4148		
C <sub>42</sub>	= 100 nF	50 V		D <sub>6</sub> = D <sub>9</sub> = D <sub>13</sub> = D <sub>14</sub> = D <sub>18</sub>	= 1N4007		
C <sub>43</sub>	= 470 μF	25 V		D <sub>12</sub> = D <sub>15</sub> = D <sub>16</sub> = D <sub>17</sub>	= 1N5400		
C <sub>44</sub>	= 33 pF	50 V	NP0	DZ <sub>1</sub>	= 7.5 V ½W		
C <sub>45</sub>	= 2,2 pF	50 V	NP0	Tr <sub>1</sub> = Tr <sub>2</sub> = Tr <sub>3</sub> = Tr <sub>4</sub>	= SD 1446		
C <sub>46</sub>	= 100 nF	50 V		Tr <sub>5</sub>	= BD 241 BFP		
C <sub>47</sub>	= 470 nF	100 V	Polyester	Tr <sub>7</sub> = Tr <sub>8</sub> = Tr <sub>9</sub>	= BC 547		
				Tr <sub>10</sub>	= BC 557		
				Tr <sub>11</sub>	= BC 327		

Tr<sub>6</sub> = BF 199  
 Tr<sub>5</sub> = BD 241  
 Tr<sub>1</sub> = Tr<sub>2</sub> = Tr<sub>3</sub> = Tr<sub>4</sub> = SD 1406  
 L<sub>1</sub> = L<sub>2</sub> = L<sub>3</sub> = L<sub>4</sub> = 2,2 μH  
 L<sub>5</sub> = 10 μH  
 L<sub>6</sub> = L<sub>7</sub> = VK 200 1 wire  
 L<sub>8</sub> = L<sub>9</sub> = L<sub>10</sub> = L<sub>11</sub> = VK 200 2 wires  
 Rl<sub>1</sub> = Relè 12 V 3022  
 Rl<sub>2</sub> = Relè 12 V 4052  
 Fuse = 3 x 12A  
 T<sub>3</sub> = T<sub>4</sub> = T<sub>5</sub> = Input transformers  
 T<sub>1</sub> = T<sub>2</sub> = T<sub>6</sub> = Output transformers

### List of components board B

C<sub>1</sub> = 10 nF 50 V  
 C<sub>2</sub> = 10 nF 50 V  
 C<sub>3</sub> = 10 nF 50 V  
 C<sub>4</sub> = 10 nF 50 V  
 C<sub>5</sub> = 10 nF 50 V  
 C<sub>6</sub> = 10 nF 50 V  
 C<sub>7</sub> = 10 nF 50 V  
 C<sub>8</sub> = 10 nF 50 V  
 C<sub>9</sub> = 10 nF 50 V  
 C<sub>10</sub> = 10 nF 50 V  
 C<sub>11</sub> = 22 μF 16 V  
 R<sub>1</sub> = 100 Ω 2 W  
 R<sub>2</sub> = 68 Ω 2 W  
 R<sub>3</sub> = 27 Ω 2 W  
 R<sub>4</sub> = 10 Ω 2 W  
 R<sub>5</sub> = 1.0 KΩ ¼W  
 R<sub>6</sub> = 1.0 KΩ ¼W  
 R<sub>7</sub> = 8.2 KΩ ¼W  
 R<sub>8</sub> = 10 KΩ ¼W  
 R<sub>9</sub> = 1.0 KΩ ¼W  
 R<sub>10</sub> = 1.0 KΩ ¼W  
 R<sub>11</sub> = 1.0 KΩ ¼W  
 R<sub>12</sub> = 1.0 Ω ½W  
 R<sub>13</sub> = 8.2 KΩ ¼W  
 R<sub>14</sub> = 1.0 KΩ ¼W  
 R<sub>15</sub> = 4.7 KΩ ¼W  
 Ic<sub>1</sub> = LM 3915N  
 Rl<sub>1</sub> = 30.22.0.012  
 Rl<sub>2</sub> = 30.22.0.012  
 Led<sub>1-11</sub> = LED  
 J<sub>9</sub> = RJ 45 Connector

### List of components remote

C<sub>1</sub> = 10 nF 50 V  
 C<sub>2</sub> = 10 μF 16 V  
 C<sub>3</sub> = 10 nF 50 V  
 C<sub>4</sub> = 10 nF 50 V  
 C<sub>5</sub> = 10 nF 50 V  
 C<sub>6</sub> = 10 nF 50 V  
 C<sub>7</sub> = 10 nF 50 V  
 C<sub>8</sub> = 10 μF 16 V  
 R<sub>1</sub> = 1.0 KΩ ¼W  
 R<sub>2</sub> = 1.0 KΩ ¼W  
 R<sub>3</sub> = 10 KΩ ¼W  
 R<sub>4</sub> = 1.0 KΩ ¼W  
 R<sub>5</sub> = 1.0 KΩ ¼W  
 R<sub>6</sub> = 1.0 KΩ ¼W  
 R<sub>7</sub> = 8.2 KΩ ¼W  
 R<sub>8</sub> = 8.2 KΩ ¼W  
 Ic<sub>1</sub> = LM 3915N  
 Led<sub>1-11</sub> = LED  
 J<sub>1</sub> = RJ 45 Connector